

The impact of Generative Artificial Intelligence (AI) on digital content marketers in South Africa

Alexa Reinecke

Student number: 2758145

Student email: 2758145@students.wits.ac.za

Supervisor: Laurence Beder

A research proposal submitted to the Faculty of Commerce, Law and Management, University of the Witwatersrand, in partial fulfilment of the requirements for the degree of Master of Management in the field of Digital Business

Johannesburg, 2024

KEYWORDS

Generative artificial intelligence; digital content marketing; Task-Technology Fit

SENATE PLAGIARISM POLICY

Declaration by Student

I, Alexa Reinecke (Student number: 2758145), am registered for MMDB PT 2024 Research Methodology BUSA7480A. I hereby declare the following:

- I know plagiarism (using someone else's work without their permission and acknowledging the source) is wrong.
- I confirm that ALL the work submitted for assessment for the above course is my unaided work except where I have explicitly indicated otherwise.
- I have followed the required conventions in referencing the thoughts and ideas of others.
- I understand that the University of the Witwatersrand may take disciplinary action against me if there is a belief that this is not my unaided work or that I need to acknowledge the source of the ideas or words in my writing.



Signature:

Date: 11 December 2024

TABLE OF CONTENTS

SENATE PLAGIARISM POLICY	ii
TABLE OF CONTENTS	iii
LIST OF TABLES.....	v
LIST OF FIGURES	vi
LIST OF ACRONYMS	vii
CHAPTER 1 - INTRODUCTION.....	1
1.1 STATEMENT OF PURPOSE	1
1.2 RESEARCH BACKGROUND.....	2
1.3 RESEARCH PROBLEM.....	4
1.4 RESEARCH QUESTIONS	4
1.4.1 PRIMARY RESEARCH QUESTION	5
1.4.2 SUB-QUESTION 1: TASK-TECHNOLOGY FIT	5
1.4.3 SUB-QUESTION 2: UTILISATION	5
1.4.4 SUB-QUESTION 3: PERFORMANCE IMPACTS.....	5
1.5 RATIONALE	6
1.6 RESEARCH DELIMITATIONS	6
1.7 DEFINITION OF TERMS	7
1.8 ASSUMPTIONS	8
CHAPTER 2 - LITERATURE REVIEW AND THEORETICAL FRAMEWORK.....	10
2.1 INTRODUCTION.....	10
2.2 KEY CONCEPTS AND DEFINITIONS.....	10
2.2.1 GENERATIVE AI	10
2.2.2 LARGE LANGUAGE MODELS (LLMs)	10
2.2.3 GENERATIVE AI IN AFRICA.....	11
2.2.4 CONTENT MARKETING	12
2.3 ANALYTICAL FRAMEWORK.....	12
2.3.1 THEORETICAL FRAMEWORK	12
2.3.2 GUPTA ET AL.'S SEVEN AREAS OF IMPACT FRAMEWORK	15
2.4 RESEARCH QUESTIONS	16
2.4.1 RESEARCH QUESTION 1	17
2.4.2 RESEARCH SUB-QUESTION 1: TASK-TECHNOLOGY FIT.....	17
2.4.3 RESEARCH SUB-QUESTION 2: UTILISATION	17
2.4.4 RESEARCH SUB-QUESTION 3: PERFORMANCE IMPACTS.....	17
2.5 CONCEPTUAL FRAMEWORK.....	19
CHAPTER 3 - RESEARCH METHODOLOGY.....	21
3.1 RESEARCH PARADIGM	21
3.2 QUALITATIVE RESEARCH APPROACH.....	21
3.3 THEORETICAL FRAMEWORK	21
3.4 DATA COLLECTION METHODS.....	22

3.5	SAMPLE AND SAMPLING METHOD	23
3.6	DATA ANALYSIS STRATEGIES	24
3.7	ENSURING RESEARCH QUALITY	24
3.8	ETHICAL CONSIDERATIONS	25
3.9	CONCLUSION	25
CHAPTER 4 - RESEARCH FINDINGS		27
4.1	INTRODUCTION	27
4.2	INTERVIEW INSIGHTS: GENERATIVE AI SOFTWARE UTILISATION	28
4.3	INTERVIEW INSIGHTS: PARTICIPANT OCCUPATION AND UTILISATION	30
4.4	ANALYSIS OUTCOMES: MAJOR THEMES AND CODING FRAMEWORK	32
4.4.1	FINDINGS OF THEME 1	32
4.4.2	FINDINGS OF THEME 2	43
4.4.3	FINDINGS OF THEME 3	53
4.5	CONCLUSION	57
CHAPTER 5 - RESEARCH FINDINGS		59
5.1	INTRODUCTION	59
5.2	TASK-TECHNOLOGY FIT	59
5.2.1	RESEARCH SUB-QUESTION 1:	59
5.2.2	CONCLUSION	61
5.3	UTILISATION	62
5.3.1	RESEARCH SUB-QUESTION 2:	62
5.3.2	CONCLUSION	65
5.4	PERFORMANCE IMPACT	65
5.4.1	RESEARCH SUB-QUESTION 3:	65
5.4.2	CONCLUSION	67
CHAPTER 6 - RECOMMENDATIONS		68
6.1	INTRODUCTION	68
6.2	CONCLUSION	68
6.2.1	TASK-TECHNOLOGY FIT:	68
6.2.2	HIGH UTILISATION LEVELS:	68
6.2.3	NOTABLE PERFORMANCE IMPACTS:	68
6.3	RECOMMENDATIONS	69
6.3.1	BESPOKE AFRICAN AI SOLUTIONS	69
6.3.2	ORGANISATIONAL ACCESS, COMPATIBILITY, AND SECURE GENERATIVE AI	69
6.3.3	ADOPTION FOR NEW MARKET ENTRANTS	70
6.4	FURTHER STUDY	70
APPENDIX A		73
REFERENCES		73

LIST OF TABLES

Table 1: Eight User Evaluation Factors (Adapted from Goodhue & Thompson, 1995).....	14
Table 2: Seven generative AI impact areas (adapted from Gupta et al., 2024).....	16
Table 3: Task-Technology Fit Sub Theme Code Summary A	30
Table 4: Task-Technology Fit Sub Theme Code Summary B	32
Table 5: Task-Technology Fit Theme Code Summary	34
Table 6: Utilisation Theme Code Summary	45
Table 7: Performance Impact Theme Code Summary	54

LIST OF FIGURES

Figure 1: A comparative illustration of AI and its components (adapted from Lily & Lytras, 2023).....	2
Figure 2: Digital content marketing context (Adapted from Content Marketing Institute, n.d.).	3
Figure 3 The generative AI landscape (adapted from Gartner, 2024)	11
Figure 4 Technology-to-Performance Chain model (Goodhue & Thompson, 1995).	13
Figure 5 Conceptual framework (adapted from Goodhue & Thompson's (1995) TPC-Model and Gupta et al.'s (2024) Generative AI Impact Framework).	19

LIST OF ACRONYMS

AI	Artificial Intelligence
DL	Deep Learning
LLM	Large Language Model
ML	Machine Learning
SEO	Search Engine Optimisation
TPC	Technology-to-Performance Chain
TTF	Task-Technology Fit

Generative AI stands as a beacon of transformative potential for Africa. Embracing an Africa-centric approach, this cutting-edge technology offers a unique chance to address the continent's specific challenges through innovation tailored to its rich cultural tapestry and diverse linguistic heritage.

- Dr Mark Nasila

CHAPTER 1 – INTRODUCTION

1.1 Statement of Purpose

This qualitative research study aimed to investigate how South African digital marketers use Generative Artificial Intelligence (generative AI) to create content. Globally, Generative AI is at the peak of the inflated expectations stage in the Gartner Hype Cycle (Gartner, 2024), reflecting the high excitement and exploration of its current potential (Turner, 2024).

Generative AI is a disruptive technology that significantly impacts content discovery, creation, authenticity and regulatory considerations. It is anticipated to mature within two to five years, and as a groundbreaking technology, it is expected to continue to shape the future of marketing technologies (Turner, 2024).

From a global perspective, research has shown that Generative AI is significantly transforming digital marketing content creation by enhancing profitability, reducing costs, and improving operational efficiency worldwide (Gartner, 2024). However, despite this growing interest, the impact and role of Generative AI in the South African digital marketing sector still need to be better understood.

Digital marketers use generative AI to instantly create multiple types of content, including text, images, video and audio, based on simple natural language prompts (Gartner, 2024). Due to the disruptive nature of this technology, this research study aimed to explore how early adopters utilise Generative AI in digital content marketing in South Africa, particularly during this period of high expectations (Gartner, 2024).

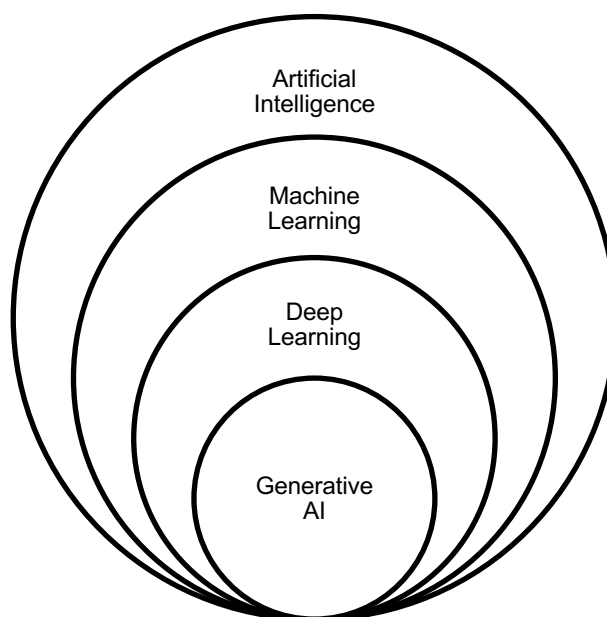


Figure 1: A comparative illustration of AI and its components (adapted from Lily & Lytras, 2023).

This section explores the research background by defining the technology's scope, the marketing sector that uses it, and the digital marketers relevant to this study.

As illustrated in Figure 1 (Lily & Lytras, 2023), AI is the broadest category with multiple subsets, each representing a different level of technological advancement. Artificial Intelligence (AI) enables computers to mimic human behaviour, such as learning, decision-making, pattern recognition and problem-solving. Within AI, Machine Learning (ML) uses advanced algorithms to find patterns in large datasets, helping machines to improve over time through different learning methods (Lily & Lytras, 2023).

A more advanced subset of ML is Deep Learning (DL), which uses neural networks with multiple layers to process data. This technology mimics the human brain by extracting high-level features from raw data. At the core, a branch of DL called generative AI is more sophisticated and capable of creating new content like text, images or code. Generative AI can analyse large datasets to identify patterns and autonomously generate creative outputs. This ability makes it a crucial focus of this study, highlighting its valuable application in marketing (Lily & Lytras, 2023).

From a marketing perspective, this research delved into content marketing within the broader marketing sector, aiming to understand how it facilitates profitable customer interactions through

meaningful content tailored to specific audiences, as illustrated in Figure 2 (Content Marketing Institute, n.d.).

This research study specifically examined digital content marketing, a subset of content marketing which leverages digital platforms to deliver personalised brand-related content, thereby enhancing consumer interaction and trust (Holliman & Rowley, 2014; Pulizzi, 2014; Rancati & Gordini, 2014, as cited in Hollebeek & Macky, 2018).

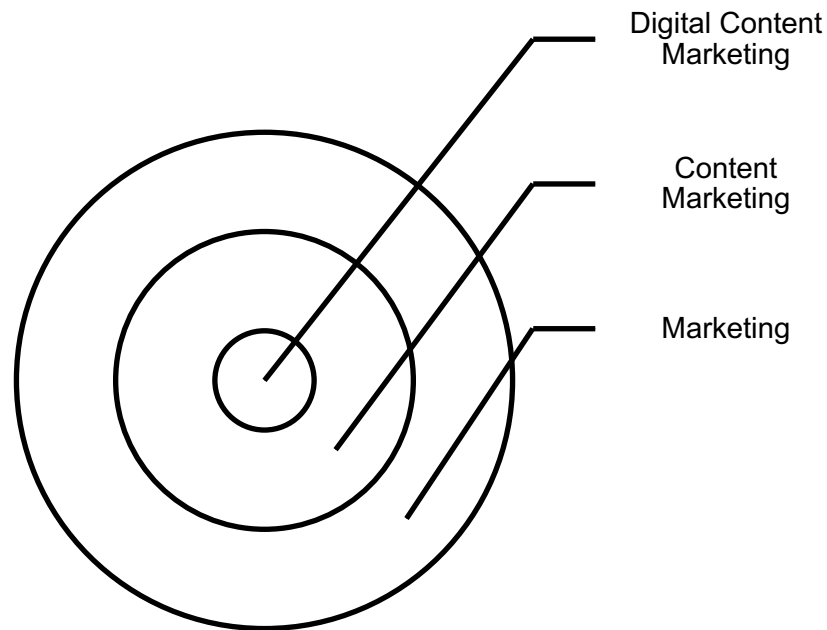


Figure 2: Digital content marketing context (Adapted from Content Marketing Institute, n.d.).

The research focused on three categories of digital marketing content creators within South Africa: designers, writers and a broadly defined category of digital marketing and generative AI professionals who interlink with various content creation functions and roles.

1. Designers: This category includes graphic designers, animators, user experience (UX), and user interface (UI) designers.
2. Writers: This category encompasses SEO specialists and copywriters.
3. Digital marketing and generative AI professionals: This broad category includes digital marketing managers, social media managers and other related roles.

Participants who actively use generative AI for content creation were purposely chosen. Therefore, the study is not limited to a specific industry; it encompasses multiple sectors, as marketing professionals employing generative AI serve diverse clients across various industries.

The scope of digital marketing professions was intentionally broad and varied to ensure a comprehensive representation of generative AI use in the digital content generation industry. However, the precise scope of the research depended on willing participants in specific roles.

The research excluded many digital marketing professionals, such as media buyers or product and brand managers, whose roles do not directly overlap with using generative AI in digital content strategies.

In conclusion, this section laid the groundwork for the study by illustrating the technological framework of AI and its applications in digital content marketing and highlighting the purposeful selection of participants.

1.3 Research Problem

Generative AI is a disruptive technology with an estimated annual economic value of \$4.4 trillion (Manyika et al., 2023). Its rapid adoption is projected to enhance productivity and efficiency by 56%, reduce costs by 32%, and boost innovation and growth by 31% (Deloitte, 2024). As such, this technology holds significant potential to reshape marketing strategies and drive innovation in South Africa.

Despite growing global interest, limited research has examined how South African digital marketers are adopting and applying generative AI for content creation. While the transformative impact of generative AI on digital marketing is widely acknowledged, the specific ways in which South African practitioners utilise the technology remain underexplored. This gap presents an opportunity to investigate its meaningful, context-specific applications in regional content marketing.

The article *AI: The African Opportunity* (Clynch, 2024) highlights critical issues such as AI's biases and shortcomings in the African context. One major challenge is the scarcity of African-centric data used to train AI models, which contributes to cultural inaccuracies and performance gaps in AI tools deployed on the continent. These biases manifest in various ways, such as poor recognition of African names, limited support for local languages, and inaccurate cultural representations. As a result, generative AI technologies often fail to produce relevant or inclusive outputs for African users.

This study aims to investigate this complex dynamic using Goodhue and Thompson's (1995) Technology-to-Performance Chain (TPC) model (see Chapter 2). The study will explore how

generative AI is used during its current phase within the hype cycle and evaluate the challenges of producing content tailored to a uniquely African audience.

South African digital marketers must harness generative AI capabilities to remain competitive in a rapidly evolving landscape (Deloitte Digital, 2023). At the same time, they must address the nuanced challenge of creating content that resonates with South Africa's culturally and linguistically diverse audiences, an environment that includes twelve official languages and a wide range of demographic and psychographic profiles.

Accordingly, this study investigates the gap in understanding how South African digital marketers adapt to generative AI, particularly in navigating content creation challenges for diverse audiences, where minimal context-specific research currently exists.

The TPC model asserts that technology's effectiveness is determined by how well it aligns with the tasks it is intended to support (Goodhue & Thompson, 1995). Therefore, this model serves as a relevant analytical framework for this research and includes five key components: task characteristics, technology characteristics, task-technology fit, utilisation, and performance impact.

1.4 Research Questions

1.4.1 Primary Research Question

How are South African digital marketers using generative AI for content generation? Three sub-questions were derived from this primary question.

1.4.2 Sub-question 1: Task-Technology Fit

How well do content generation tasks match the capabilities of generative AI technologies, considering the cultural and linguistic diversity of South African audiences?

1.4.3 Sub-question 2: Utilisation

How does the perceived task-technology fit affect digital marketers' use of generative AI?

1.4.4 Sub-question 3: Performance Impacts

How does the perceived impact of generative AI affect the performance of digital marketers in their content creation processes?

1.5 Rationale

The research is grounded in the observation that generative AI is reshaping content creation strategies, significantly boosting marketing efficiency and personalisation on a global scale (Deloitte, 2023). Recognising this potential, Deloitte Africa launched the Generative AI Africa initiative in 2023 to enhance generative AI literacy across the continent. In South Africa, where digital marketing practices are rapidly evolving, generative AI introduces new challenges and opportunities tailored to the country's diverse market (Deloitte, 2023).

While the rise in AI-generated content is evident (Prunty, 2023), detailed analyses of its utilisation in South Africa remain limited. Therefore, this research explores the use of generative AI for creating personalised content, particularly in a culturally rich and linguistically diverse market such as South Africa.

The findings of this study are expected to benefit multiple stakeholder groups. Digital marketers and agencies can gain insight into how to better integrate generative AI tools to improve campaign efficiency, reduce content production time, and tailor messaging to diverse audiences. Technology developers and AI software providers may use the results to refine and localise their platforms for African contexts. Additionally, marketing educators and policymakers may draw on the findings to inform training programs and regulatory frameworks that foster inclusive and ethical AI adoption.

Overall, the study aims to contribute to ongoing discussions on how generative AI can enhance engagement and relevance in content marketing across diverse South African consumer segments. While the research does not claim to be exhaustive, it seeks to provide a strong foundation for future exploration in this rapidly evolving field.

1.6 Research Delimitations

Specific boundaries are set to maintain the research's focus. These delimitations ensure that the research remains relevant and produces insights particular to the study's scope.

The research study focuses specifically on South Africa, examining the practices of local digital marketing professionals. By concentrating on this region, the study explores the cultural and linguistic diversity that influences content-creation practices in South Africa without considering broader African or global markets.

Furthermore, certain delimitations are imposed from a theoretical point of view as the research is guided by Goodhue and Thompson's (1995) Technology-to-Performance Chain (TPC) model.

The scope is also limited to digital content formats, including text, images, audio and video, excluding non-digital content and other digital marketing tools not involving generative AI.

The research's methodological framework serves as another delimitating factor. The methodological approach, structured by the TPC model, is tailored to capture qualitative insights through a targeted approach, which further shapes the research boundaries. The analysis employs qualitative content analysis to identify themes related to using generative AI in digital content marketing. This focus means the research did not statistically quantify data or analyse broader market trends. Instead, it interprets rich textual data to uncover thematic content (Hsieh & Shannon, 2005).

Additionally, the research targets digital marketers who are actively using generative AI for content generation. This purposive sampling ensures that the research captures informed, relevant, and substantial insights into how AI is integrated into content marketing strategies (Crick, 2021). Focusing on this group excludes the perspectives of outlying professionals who might only indirectly interact with content marketing practices (Crick, 2021).

Lastly, while the research recognises the use of generative AI in broader marketing strategies, it only delves into content generation. Similarly, while regulatory and ethical considerations are crucial in using generative AI within marketing, this research does not focus on legal or ethical analyses.

Through these delimitations, the research is tailored to provide clear and specific insights into the use of generative AI among digital content marketers in South Africa.

1.7 Definition of Terms

1. Artificial General Intelligence (AGI): A future AI that could understand and perform any intellectual task that a human can do (Gartner, 2024).
2. ChatGPT: An AI chatbot by OpenAI that generates human-like text based on a model trained on vast amounts of diverse text data (Gartner, 2024).
3. Content Marketing: Content marketing is a strategic approach focused on creating and distributing valuable, relevant, and consistent content to attract and retain a clearly defined audience and drive profitable customer action (Content Marketing Institute, n.d.).
4. Digital Marketing: The marketing of products or services using digital technologies on the internet, through mobile phone apps, display advertising and any other digital mediums (Content Marketing Institute, n.d.).

5. Generative Artificial Intelligence (Generative AI): Generative AI is a category of AI technologies that can automate the creation of content that mimics human creativity across various formats, including text, images, video, and audio. These technologies are built on advanced machine-learning algorithms and can be prompted through natural language (Gartner, 2024).
6. Hype Cycle: A graphical depiction of a common pattern that arises with each new technology or innovation. According to Gartner, a hype cycle tracks the progress of technologies from conception and initial enthusiasm to maturity and widespread adoption (Gartner, 2024).
7. Machine Learning Algorithms: These algorithms allow software applications to become more accurate in predicting outcomes without being explicitly programmed to do so. They are used extensively in generative AI to generate content (Statista, 2023).
8. Natural Language Processing (NLP): NLP is a field of artificial intelligence that allows machines to read, understand and derive meaning from human languages (Adobe Experience Cloud Team, 2023).
9. Natural Language Technologies (NLT): AI that analyses and understands human language to assess emotions and personality in text, using advanced techniques like neural networks (Gartner, 2024).
10. UI (User Interface) Designers: Designers who design the look and layout of interfaces, including buttons, icons, spacing, typography and colour schemes. They aim to create visually appealing and intuitive interfaces that enhance the user's interaction with the product (Figma, n.d.).
11. UX (User Experience) Designers: Designers who research user needs, create user personas, wireframes and prototypes, and ensure the product provides a seamless and enjoyable experience. They prioritise usability, functionality and user satisfaction (Figma, n.d.).

1.8 Assumptions

Participants in this study were purposively selected based on their active use of generative AI tools for content creation, ensuring that each had a foundational understanding of the technology. While variations in technological proficiency were expected, all participants met the inclusion criteria to provide informed and contextually relevant insights.

Moreover, the selection of digital marketers is intentionally diverse to capture various experiences and perspectives within the South African content marketing industry. While not

aiming for statistical representativeness, this purposive sampling is assumed to provide rich, contextual insights that may reflect common themes.

Another underlying assumption is that generative AI technologies maintain consistency in their capabilities and performance throughout the research. Changes in technology could alter participants' responses, affecting the identification of patterns.

The research further accepts that South Africa's cultural and linguistic diversity significantly impacts how digital marketers utilise generative AI technologies. This assumption is integral to exploring how AI tools are used to meet the diverse needs of the consumer base.

Lastly, it is also assumed that digital marketers use generative AI ethically. This assumption is paramount to ensuring the ethical integrity of AI applications in digital content creation. However, the ethical use of generative AI is outside the scope of this research.

CHAPTER 2 – LITERATURE REVIEW AND THEORETICAL FRAMEWORK

2.1 Introduction

The literature review aims to evaluate the current literature and industry insights to establish a solid foundation for understanding the role and impact of generative AI in digital marketing in South Africa. This chapter will explore the existing body of knowledge and establish the theoretical framework, building on foundational work to inform the research design and methodology within the scope of South African content marketing.

2.2 Key Concepts and Definitions

2.2.1 Generative AI: A Global Perspective

Understanding key concepts and definitions is essential for grasping the role and impact of generative AI in digital marketing. In his book *African Artificial Intelligence*, Dr Mark Nasila (2024) describes crucial moments in generative AI evolution, starting with Georges Artsrouni's "mechanical brain" in 1932 and Noam Chomsky's grammatical rules in 1957. Recent highlights are DALL-E in 2021, Stable Diffusion in 2022, and ChatGPT in 2023, showcasing generative AI's rapid advancements and growing impact.

The global generative AI landscape is diverse, with several prominent generative AI platforms offering unique capabilities, each contributing to different aspects of content creation and development. OpenAI's ChatGPT produces text-based responses that simulate human-like interactions, enhancing the conversational experience of creation. Complementing this, DALL-E 3 by OpenAI transforms textual prompts into visual creations, bridging the gap between text and imagery.

Similarly, Google Bard and Meta's Llama 2 generate text and answer questions, providing versatile language support. In the field of visual art, Midjourney converts text prompts into striking visual pieces. GitHub Copilot is an AI assistant for developers, offering code suggestions to streamline development processes. These platforms demonstrate the broad range of applications and innovations in generative AI (Nasila, 2024).

2.2.2 Large Language Models (LLMs)

The research study focuses exclusively on the use of generative AI in content marketing, specifically those driven by Large Language Models (LLMs). LLMs are trained on immense public or private text data volumes and are built to interpret text and generate human-like

responses. They have revolutionised content marketing by enabling marketers to create images, videos or audio through a simple descriptive prompt (Gartner, 2024).

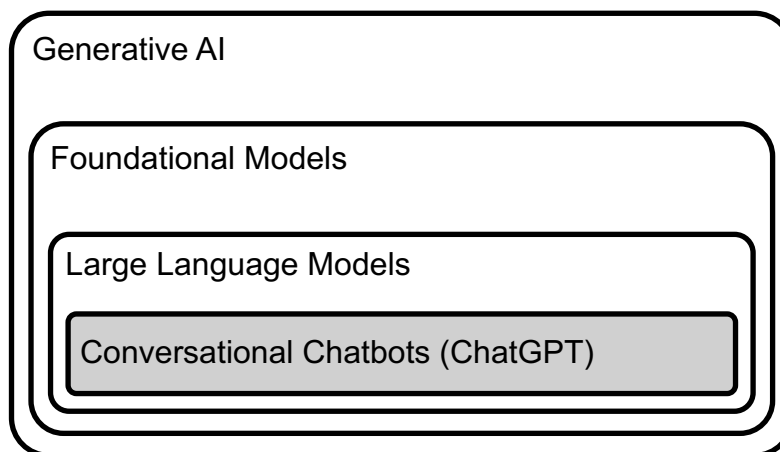


Figure 3: The generative AI landscape (adapted from Gartner, 2024)

Figure 3 highlights the role of LLMs within the broader AI landscape. Generative AI, which creates new content by learning from data, forms the core of this landscape. At the heart of generative AI are foundational models, large AI systems trained on extensive datasets. Among these, LLMs stand out for their ability to understand and generate human-like text. Leveraging LLMs, conversational chatbots like ChatGPT and BARD engage users in interactive dialogues. Examples of LLMs include Google’s LaMDA and BERT, Meta’s LLaMA, Baidu’s ERNIE, and OpenAI’s GPT-4 (Gartner, 2024).

2.2.3 Generative AI in Africa

Interest in generative AI within the African context is growing, with organisations like Lelapa AI investing in natural language processing technology such as VulaVula, available in multiple languages, including English, Afrikaans, isiZulu and Sesotho. However, a significant challenge remains: AI technologies often lack sufficient knowledge of African languages and names, which hinders the development of Africa-centric AI solutions (Tsanni, 2023).

Nasila (2024) argues that while AI holds tremendous economic potential for emerging African economies, Africa must develop tailor-made AI solutions rather than relying on off-the-shelf imports. He emphasises that African businesses must rework and adapt AI technologies to meet the continent’s unique needs and challenges. This is especially relevant in the use of generative AI in South Africa, which is the focus of this research study.

2.2.4 Content Marketing

Since the launch of OpenAI's ChatGPT in November 2022, the potential of LLMs to revolutionise marketing has grown significantly. These advancements have ushered in a new era of content generation. Content marketing is fuelled by content generation and explores how brands create and distribute valuable, relevant and consistent content to attract and engage a clearly defined target audience, ultimately driving profitable customer actions. Content marketing seamlessly integrates with various communication channels, including social media marketing, email marketing, and search engine optimisation (SEO) (Content Marketing Institute, n.d.), and it encompasses various formats such as text, audio, video and images (Adobe Experience Cloud Team, 2023).

Within this framework, digital content marketing is a key subset, defined by its delivery through digital platforms. It involves creating and distributing valuable brand-related content to enhance consumer interaction and build trust (Holliman & Rowley, 2014; Pulizzi, 2014; Rancati & Gordini, 2014, as cited in Hollebeek & Macky, 2018). As LLMs evolve, they will further transform digital content marketing, enabling brands to engage with their audiences more personally and effectively.

2.3 Analytical Framework

2.3.1 Theoretical Framework

The Technology-to-Performance Chain (TPC) model, an extension of the Task-Technology Fit (TTF) model, provides an ideal framework for this research as it can be used to explore how well generative AI technology is utilised for content creation tasks. The TPC model suggests that a good fit between tasks and technology enhances both utilisation and performance, integrating elements from the Technology Acceptance Model (TAM), such as perceived ease of use and usefulness (Goodhue & Thompson, 1995).

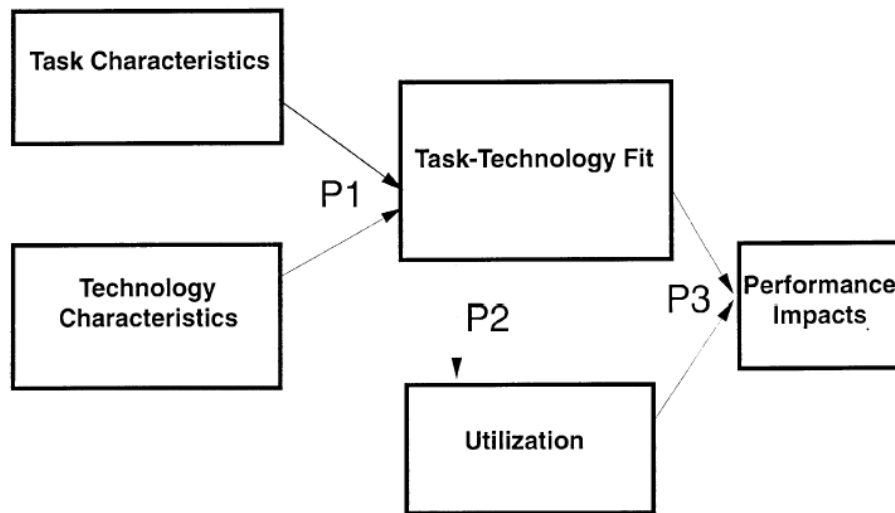


Figure 4: Technology-to-Performance Chain (TPC) model (Goodhue & Thompson, 1995).

The model comprises five key elements: technology, task, task-technology-fit, utilisation and performance impacts. The logical flow of the model begins with task and technology characteristics influencing the task-technology fit (P1), which then affects technology utilisation (P2) and ultimately impacts performance (P3) (Goodhue & Thompson, 1995).

The Task-Technology Fit (TTF) model identifies eight user evaluation factors that contribute to the fit between tasks and technology: data quality (generative AI quality in this case), capability, authorisation, compatibility, timeliness, reliability, ease of use/training and relationship (Goodhue & Thompson, 1995). These factors affect utilisation and refer to the extent to which generative AI technology is used, influenced by the participant's perceived dependence on the technology. By investigating these factors, the research aims to determine how well generative AI tools align with digital marketers' tasks and how this alignment impacts their performance. These factors include:

1. Generative AI Quality	Evaluate the accuracy and relevance of AI-generated content. High-quality outputs could encourage more frequent and confident use by digital marketers.
2. Capability	Examine how well generative AI meets the functional requirements of digital marketers. If the technology efficiently fulfils their needs, it will likely be used regularly.

3. Authorisation	Assess the security and access control mechanisms of generative AI tools. Secure systems should enhance user trust and encourage frequent use, while access restrictions would naturally hinder use.
4. Compatibility	Determine the seamlessness of generative AI integration with existing systems. Reduced friction and ease of incorporation into workflows should increase utilisation.
5. Timeliness	Measure the promptness of responses from generative AI tools. Quick access to information or content makes the tools more valuable and likely to be used regularly.
6. Reliability	Investigate the consistency of generative AI performance. Consistent performance builds user trust and reliance, logically leading to higher utilisation rates.
7. Ease/Training	Explore the user-friendliness of interfaces and the adequacy of training provided. Reduced learning curves facilitate easier adoption and continued use of the technology.
8. Relationship	Evaluate the quality of support and interpersonal aspects, such as responsive customer service and helpful interactions with AI tools. Good support enhances the user experience, encouraging more frequent use.

Table 1: Eight User Evaluation Factors (Adapted from Goodhue & Thompson, 1995).

The eight user evaluation criteria are crucial for understanding how digital marketers employ generative AI tools and how this utilisation impacts their performance, which is the model's outcome. To assess these performance impacts, this research explores user perceptions of how generative AI enhances their work, focusing on efficiency, effectiveness, and overall productivity improvements in AI-driven content creation tasks (Goodhue & Thompson, 1995). This exploration is conducted through semi-structured interviews (see Chapter 3) to gather rich qualitative data on the interplay between technology, individuals and their tasks.

To build on this, Gupta et al.’s (2024) Seven Areas of Impact Framework classifies task-technology fit criteria within the vast world of generative AI applications, thereby enriching the application of the TPC model in this research.

2.3.2 Gupta et al.’s Seven Areas of Impact Framework

The framework provided by Gupta et al. (2024) in their research titled *Adoption and Impacts of Generative Artificial Intelligence: Theoretical Underpinnings and Research Agenda* offers a relevant framework for this analysis. By identifying seven key areas of generative AI’s impact, customer engagement, customer service, customer experience, content creation, personalisation, lead generation and consumer behaviour, Gupta et al. (2024) provide a comprehensive set of generative AI tasks and technology characteristics.

These seven areas serve as a tool to narrow down the vast world of generative AI applications in digital content marketing, establish the task-technology fit within the chosen model, and ensure the research is well-aligned with the TPC model.

The table below expands on each characteristic, as Gupta et al. (2024) described using ChatGPT as an example. However, this study does not exclude any generative AI technologies, as the characteristics remain the same regardless of the chosen software. These characteristics also inform the interview questions of this study concerning performance impact to ensure the research methodology is well aligned with the theoretical framework.

Generative Task Characteristic	Description
1. Customer Engagement	ChatGPT enhances engagement by offering real-time, personalised content interactions. This AI-driven approach helps marketers create content that resonates with audiences, fostering stronger connections (Gupta et al., 2024).
2. Customer Service	ChatGPT automates content-related customer service, reducing support team workload and improving response times. This efficiency enhances content distribution and customer satisfaction (Gupta et al., 2024).

3. Customer Experience	ChatGPT improves the content experience through natural language processing, delivering human-like interactions and optimising support. This ensures high-quality service and reduces content management costs (Gupta et al., 2024).
4. Content Creation	ChatGPT revolutionises content creation by generating coherent, engaging content at scale, including product descriptions, blog posts and social media updates. Its human-like language capabilities make content creation more efficient (Gupta et al., 2024).
5. Personalisation	ChatGPT enhances content personalisation by analysing customer data to tailor social media and email campaigns. It recommends content based on past interactions, improving engagement and conversion rates (Gupta et al., 2024).
6. Lead Generation	ChatGPT streamlines lead generation by qualifying leads and providing relevant content. It interacts with visitors on various channels, capturing leads through engaging content and improving lead quality (Gupta et al., 2024).
7. Consumer Behaviour	ChatGPT helps understand consumer behaviour by analysing content interactions and preferences. This insight allows marketers to tailor content using generative AI, increasing satisfaction and loyalty (Gupta et al., 2024).

Table 2: Seven generative AI impact areas (adapted from Gupta et al., 2024).

2.4 Research Questions

The following research questions guide the investigation into generative AI's impact on content generation in South Africa's digital marketing and provide a framework for analysing the findings. The literature review highlights the rapid advancements in generative AI, the unique challenges in the African context, and the transformative potential of generative AI in content marketing. These insights led to formulating the study's primary research question, and three sub-questions were derived from this primary question.

2.4.1 Research Question 1

How are South African digital marketers using generative AI for content generation?

2.4.2 Research sub-question 1: Task-Technology Fit

How well do content generation tasks match the capabilities of generative AI technologies, considering the cultural and linguistic diversity of South African audiences?

Based on Gupta et al.'s (2024) seven generative AI areas of impact and the applications of Large Language Models (LLMs) like ChatGPT, as detailed in Table 2, the characteristics of both the tasks and the generative technologies used for content creation are interlinked. The tasks for digital marketers using generative AI include enhancing customer engagement, automating customer service, improving customer experience, generating coherent content, personalising interactions, streamlining lead generation and understanding consumer behaviour. These tasks benefit from generative AI's ability to provide real-time, personalised interactions, automate repetitive tasks and analyse customer data for tailored content.

The literature highlights the significant impact of LLMs on creating engaging content that resonates with diverse audiences, ultimately improving marketing effectiveness. These insights underscore the essential characteristics of both the tasks and the generative AI technologies in successful content creation (Gupta et al., 2024).

2.4.3 Research sub-question 2: Utilisation

How does the perceived task-technology fit affect digital marketers' use of generative AI?

Based on the Technology-to-Performance Chain (TPC) model and the eight user evaluation factors detailed in Table 2, the perceived task-technology fit significantly impacts digital marketers' use of generative AI. High-quality outputs, functional capability, secure authorisation, seamless compatibility, prompt timeliness, consistent reliability, user-friendly interfaces and strong support relationships all enhance the utilisation of these tools. The literature highlights that when generative AI tools like ChatGPT align well with these factors, digital marketers are more likely to adopt and effectively use them, leading to improved marketing outcomes (Goodhue & Thompson, 1995).

2.4.4 Research sub-question 3: Performance Impacts

How does the perceived impact of generative AI affect the performance of digital marketers in their content creation processes?

Based on the Technology-to-Performance Chain (TPC) model and insights from the literature on task-technology fit and utilisation, generative AI impacts digital marketers' performance in three key areas: efficiency, effectiveness and productivity.

1. **Efficiency:** Generative AI tools streamline content creation by automating repetitive tasks and quickly generating high-quality content. This allows marketers to produce more content in less time, reducing the time and effort required for content creation (Gupta et al., 2024).
2. **Effectiveness:** The ability of generative AI to generate relevant, personalised and engaging content enhances the effectiveness of marketing campaigns. By tailoring content to specific audience segments and providing real-time interactions, these tools help improve customer engagement and satisfaction (Gupta et al., 2024).
3. **Productivity:** Generative AI increases productivity by allowing marketers to focus on strategic and creative tasks rather than mundane, repetitive ones. This shift enables marketers to maximise their creative potential and strategic planning, leading to better overall performance and more impactful marketing outcomes (Gupta et al., 2024).

As discussed in the context of task-technology fit, generative AI technologies have the potential to integrate seamlessly and reliably to contribute to content creation improvements. As a result, generative AI could significantly enhance digital marketers' efficiency, effectiveness and productivity in their content creation processes (Goodhue & Thompson, 1995; Gupta et al., 2024). The following conceptual framework is created based on the report's research questions.

2.5 Conceptual Framework

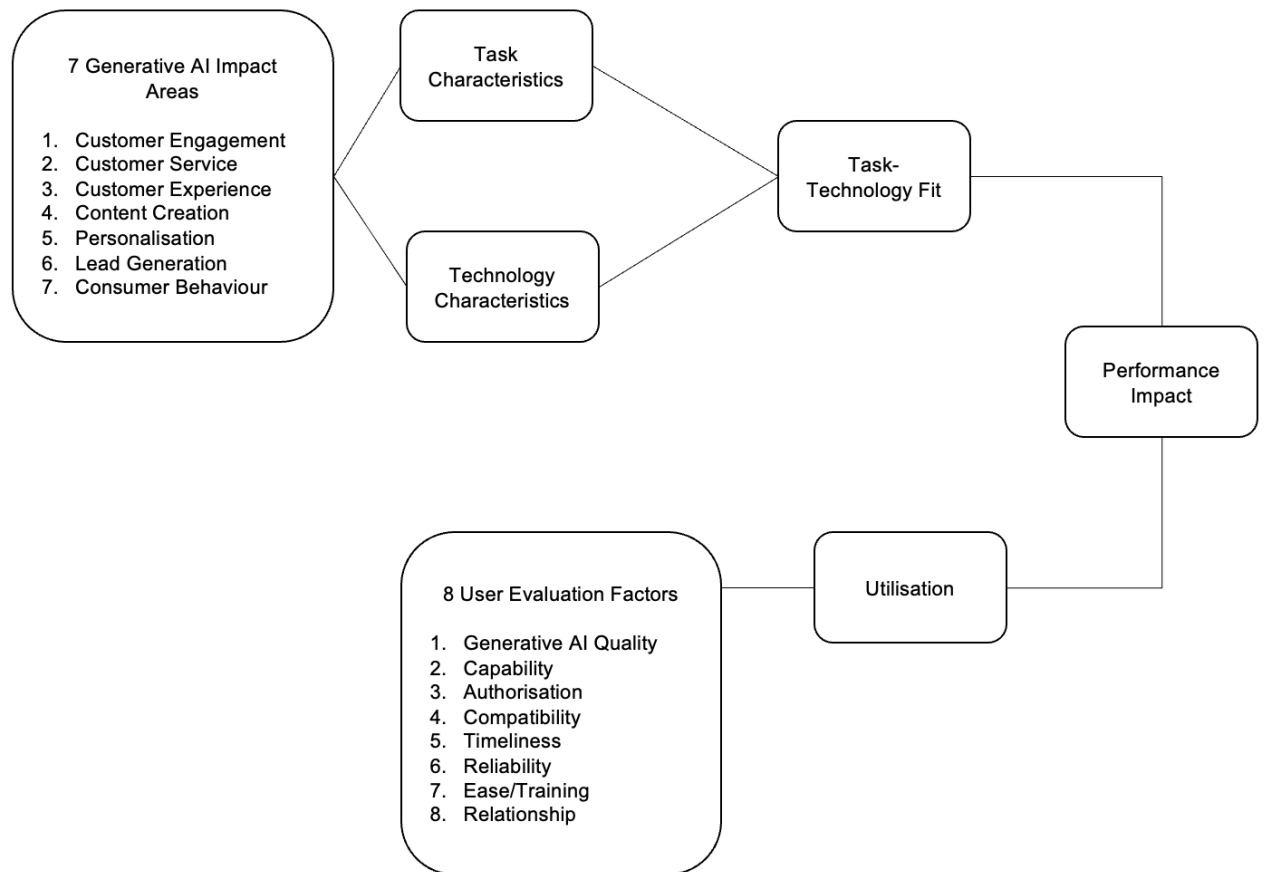


Figure 5: Conceptual framework (adapted from Goodhue & Thompson’s (1995) TPC-Model and Gupta et al.’s (2024) Generative AI Impact Framework).

As illustrated in Figure 5, the model begins with the tasks involved in content creation and the generative AI technologies employed to execute them. Next, it uses seven key generative AI impact areas to determine how well the tasks and the technology fit together. These impact areas are customer engagement, customer service, customer experience, content creation, personalisation, lead generation and consumer behaviour. These areas help narrow the vast possibilities of generative AI, focusing on the most relevant applications.

Then, the model assesses how well the tasks and the chosen generative AI technologies fit together based on the seven impact areas. This is called the task-technology fit and determines how suitable the AI tools are for completing the content creation tasks.

After establishing this fit, the model examines how often and how well digital marketers use these AI tools based on eight user evaluation factors. The eight specific user evaluation factors are generative AI quality, capability, authorisation, compatibility, timeliness, reliability,

ease/training and relationship. These factors illustrate AI tools' practical use and effectiveness in real content-creation scenarios.

Finally, the model aims to measure the overall impact of using generative AI on content creation performance. It focuses on efficiency, effectiveness, and productivity improvements, exploring if the technology is used effectively and if it benefits content creation practices.

In conclusion, generative AI can potentially transform South African digital marketing. Rapid advancements, especially with Large Language Models (LLMs), have significantly impacted content creation and marketing strategies.

Given Africa's unique linguistic and cultural diversity, tailored AI solutions are essential. As South African marketers adopt generative AI, aligning these tools with their specific tasks is crucial for maximising their benefits. This chapter establishes a theoretical foundation for understanding the impact of generative AI, paving the way for further research and practical applications in digital marketing. As illustrated in this chapter, theoretical frameworks like the Technology-to-Performance Chain (TPC) model and Gupta et al.'s (2024) Seven Areas of Impact Framework can be used to highlight how generative AI enhances efficiency, effectiveness and productivity.

CHAPTER 3 – RESEARCH METHODOLOGY

This chapter outlines the research methodology adopted in the study, applying the interpretivism paradigm and explaining the qualitative research approach. It introduces the theoretical framework guiding the study, specifically the TPC model, and provides an overview of the data collection and analysis methods.

3.1 Research Paradigm

The interpretivism paradigm is chosen for this research because it focuses on understanding how participants perceive and make sense of their world through qualitative methods. By applying this paradigm, the study values the subjective experiences of digital marketers over objective measurements, recognising the multiple realities based on their individual experiences with generative AI (Walsham, 1995).

3.2 Qualitative Research Approach

The qualitative approach best suits this research because it emphasises the context and meanings digital marketers ascribe to their experiences with generative AI, focusing on rich, detailed descriptions rather than quantifiable metrics (Petty et al., 2012). By exploring the complex, context-dependent nature of how generative AI impacts their work, this approach allows for a nuanced understanding of the participants' subjective experiences and perspectives, which is essential for this study.

3.3 Theoretical Framework

The research is guided by a dual-framework approach, integrating Goodhue & Thompson's (1995) TPC model with Gupta et al.'s (2024) Seven Areas of Impact Framework. The TPC model provides a structured way to examine the fit between tasks and technology. At the same time, Gupta et al.'s (2024) framework expands on the specific impacts of generative AI in areas such as customer engagement, customer service and personalisation. The conceptual framework (see 2.5) guides the research methodology by ensuring that the data collection methods and interview questions comprehensively cover the critical aspects of how generative AI influences digital content marketing. This dual-framework approach provides a holistic view for analysing the impact of generative AI technologies on digital marketers' performance and practices.

3.4 Data Collection Methods

A qualitative data collection method has been chosen based on the theoretical framework to ensure a rich and contextually relevant exploration of the research questions.

The primary data collection method for this study is semi-structured interviews. This choice is guided by the TPC model and Gupta et al.'s (2024) Seven Areas of Impact Framework, ensuring that the interview questions align well with the theoretical constructs.

Semi-structured interviews are particularly suitable for this research as they allow for an in-depth exploration of the subjective experiences of digital marketers using generative AI within the interpretivism paradigm.

Kallio et al.'s (2016) study, *Systematic Methodological Review: Developing a Framework for a Qualitative Semi-Structured Interview Guide*, outlines a five-phase framework for creating practical semi-structured interview guides in qualitative research. This framework is well suited to this study's research questions, as it facilitates the discovery of nuanced insights into the complex interactions between technology and users.

The five phases include identifying prerequisites, retrieving previous knowledge, formulating the preliminary guide, pilot testing and presenting the complete guide (Kallio et al., 2016). Applied to this research, the following steps have been taken: First, the suitability of semi-structured interviews for the research questions is confirmed. Next, a literature review establishes a theoretical foundation, and a conceptual framework is created to guide the drafting of the interview guide. The guide is then refined through internal feedback, and finally, the research includes the guide for transparency purposes. This structured approach ensures that the methodology is robust and well-documented (Kallio et al., 2016).

Appendix A presents the interview guide with open-ended questions drafted following the theoretical approach outlined in this study. The questions are structured to align with the conceptual framework, focusing on the TPC model and the Seven Areas of Impact described by Gupta et al. (2024). These questions aim to comprehensively explore the impact of generative AI on various aspects of digital content marketing.

The interview guide (see Appendix A) facilitates a thorough exploration of how generative AI impacts digital content marketers' content generation tasks. The methodology ensures that the questions align with the conceptual framework and that the findings are context-specific and grounded in established theoretical perspectives. This approach provides valuable insights into generative AI's practical applications and implications in digital marketing.

3.5 Sample and Sampling Method

The population for this study comprises digital marketing professionals in South Africa who actively use generative AI tools as part of their content creation processes. This includes individuals across various sectors, such as advertising, brand communication, digital strategy, and UX/UI design, who engage with AI technologies in their day-to-day work. These professionals represent a diverse group in terms of race, roles, industries, and levels of experience, unified by their integration of generative AI into digital content marketing tasks.

This study uses a purposive sampling approach to select fifteen South African digital marketers who actively use generative AI for content creation. This method was chosen to ensure that all participants had direct experience with the technology, allowing for context-specific insights aligned with the study's objectives (Crick, 2021). Given the focused nature of the research and the shared expertise among participants, fifteen interviews are sufficient to capture diverse yet thematically consistent perspectives across the digital marketing landscape.

Participants were recruited through online professional networks like LinkedIn and the researcher's digital marketing network. The recruitment focused on three key categories: designers, writers, and generative AI and digital marketing professionals. Designers include graphic designers, animators and UX/UI designers. Writers encompass SEO specialists and copywriters, while digital marketing professionals comprise digital marketing managers, social media managers, and other related roles.

Given the need for a representative sample, the willingness and availability of participants varied. To ensure accessibility and convenience for all participants, online interviews were conducted via online meeting software, further discussed in Chapter 4. These interviews were recorded and transcribed, with all interviewees remaining anonymous to protect participants' privacy. This thorough approach aimed to capture diverse insights and experiences from digital marketing professionals using generative AI, providing a broad and varied representation specific to the South African context.

3.6 Data Analysis Strategies

Qualitative content analysis is the primary research method for this study, systematically categorising digital marketers' text data into themes or patterns to interpret the meaning and context of their use of generative AI (Hsieh & Shannon, 2005).

This study employs a directed content analysis approach, building on existing theories and prior research by utilising both the TPC model (Goodhue & Thompson, 1995) and Gupta et al.'s (2024) Seven Areas of Impact Framework as coding categories. This approach provides a predefined structure for analysis based on theoretical frameworks while allowing new themes to emerge within these broader categories (Hsieh & Shannon, 2005).

The research begins by identifying key concepts from the TPC model that serve as initial coding categories, accompanied by precise definitions. Data collected through interviews with open-ended questions are analysed using these predetermined codes. To ensure a comprehensive analysis, text that does not fit the initial coding scheme has been assigned new codes that align with the broader themes established by the conceptual model (Hsieh & Shannon, 2005).

Initial codes were applied during the first reading of the data, and as new themes or patterns emerged, additional codes were created. This ensures the analysis remains adaptable, integrating new insights within the established theoretical framework (Hsieh & Shannon, 2005).

This methodology provided a nuanced understanding of how generative AI influences digital content marketing, ensuring that the findings are detailed and context-specific while remaining grounded in the theoretical frameworks of the TPC model and Gupta et al.'s (2024) Seven Areas of Impact Framework.

3.7 Ensuring Research Quality

Ensuring the trustworthiness of findings in qualitative research is critical and can be achieved through four key criteria: confirmability, dependability, credibility and transferability (Petty et al., 2012). The research design, methodology and procedures were thoroughly documented throughout the study for dependability.

To uphold confirmability, the researcher kept a detailed record of all interviews to ensure transparency and traceability. Additionally, the researcher documented potential biases through journaling and to ensure credibility, participants were allowed to review and confirm the findings, ensuring they accurately reflect their views (Petty et al., 2012).

Finally, transferability was achieved by providing rich, detailed descriptions of the study's setting, participants and context. This detailed description will help others determine if the findings apply to their situations. Clearly describing the specific conditions or variables influencing the findings will help others understand the study's boundaries and limitations.

Chapter 5 compares findings with existing literature, highlighting similarities and differences and demonstrating how the findings can be applied more broadly (Petty et al., 2012). These principles ensure the research findings are credible, dependable, confirmable and transferable.

3.8 Ethical Considerations

This research is committed to upholding the highest ethical standards to ensure fair and respectful treatment to all participants. Key principles include obtaining informed consent, maintaining anonymity and confidentiality, and minimising harm (Wiles, 2012).

All participants have given informed consent. They were given a detailed consent form explaining the study's purpose, procedures, potential risks and benefits. The form clearly stated that participation is voluntary and that participants can withdraw at any time without negative consequences. It also covered aspects such as agreeing to audio and video recordings, using direct quotations, and ensuring anonymity (Wits University, 2020).

Maintaining confidentiality is a top priority. Participants' identities and identifiable information have been anonymised in all records, analysis and reporting. Interview recordings are securely stored on the researcher's computer and backed up on iCloud, accessible only to the research team (Wits University, 2020).

Before data collection began, an ethics application was submitted, and approval was obtained from Wits University's Research Integrity Committee. This process ensured that the research met ethical standards and safeguarded participants' welfare. By adhering to these ethical considerations and ensuring transparency through the consent form, this research aimed to respect participants and maintain the credibility of the findings (Wits University, 2020).

3.9 Conclusion

In conclusion, this chapter has outlined the methodology for exploring the subjective experiences of digital marketers using generative AI. Grounded in the interpretivism paradigm and guided by the TPC model, the study adopts a qualitative approach to examine the impact of generative AI on digital content marketing.

Semi-structured interviews were conducted with a purposive sample of experienced professionals to gather detailed insights. This approach ensured the collection of rich data, which will be interpreted through a directed qualitative content analysis in Chapter 5, allowing new themes to emerge within the theoretical framework.

Finally, ethical considerations have been prioritised as the study maintained informed consent and confidentiality to ensure research integrity and credibility. Adhering to these rigorous standards, the study has aimed to produce meaningful and trustworthy findings.

CHAPTER 4 – RESEARCH FINDINGS

4.1 Introduction

This chapter presents the findings from fifteen semi-structured interviews with South African digital marketers who were purposively selected for their active use of generative AI software in content production.

Participants were selected primarily for their roles within digital marketing and their engagement with generative AI, spanning various occupations, from UI/UX designers and copywriters to marketing and generative AI specialists.

Although racial and gender diversity was key, it was not a determining factor in selecting participants. However, the diverse professional representation was carefully curated to focus on generative AI utilisation and occupational diversity. This covered various job levels, industries and organisational structures ranging from South African multinational corporations to SMEs and entrepreneurs, as well as mid, senior and executive-level professionals across all sectors. This approach was intended to capture multiple perspectives and experiences, providing rich qualitative insights critical for identifying patterns and themes across the digital marketing landscape.

The interviews were conducted via Zoom (Zoom Video Communications, Inc., 2024), recorded, and transcribed using Otter.ai (Otter.ai, 2024). The transcribed data was then analysed with Atlas.ti (Atlas.ti Scientific Software Development, 2024), a qualitative data analysis software which enabled systematic coding and theme identification.

Guided by a conceptual framework rooted in the Task-Technology Fit (TTF) model (Goodhue & Thompson, 1995) and Gupta et al.'s (2024) Seven Areas of Impact Framework, the analysis employed a directed content analysis approach (Hsieh & Shannon, 2005). This method allowed for the organisation of interview data into predefined categories based on theoretical constructs while remaining flexible to emerging new themes and insights. This structured approach ensures that the analysis is both theoretically anchored and adaptable.

The findings are organised to align with the study's primary research objectives and sub-questions, focusing on the three main themes identified in the literature review: Task-Technology Fit, Utilisation of generative AI, and Performance Impacts within South African digital marketing.

With this foundation established, the following sections present the detailed interview findings, organised by the key themes of Task-Technology Fit, Utilisation of generative AI, and Performance Impacts. Each theme is explored in-depth to reveal the insights and patterns that emerged from the experiences of South African digital marketers, providing a nuanced understanding of generative AI's role in this context.

4.2 Interview Insights: Generative AI Software Utilisation

The table below provides an overview of prominent generative AI software utilised by South African digital marketers, emphasising each tool's general application as mentioned in the interviews.

Software	Description of use
Adobe Firefly	Used for content creation, especially for generating creative visuals and assets. Supports design tasks like background filling, photo manipulation, and content creation.
Canva	Used for generating content and design elements, facilitating quick, creative marketing and visual design tasks. (Generative AI Integration)
ChatGPT	Used for generating content, paraphrasing, structuring ideas and enhancing customer engagement through conversational AI.
Claude	In general, it is similar to other generative AI tools used for content and conversational AI tasks.
Figma	Used for improving UX/UI design by suggesting user flows and enhancing the overall design process. (Generative AI Integration)
Google Gemini	Used for generating content, paraphrasing, structuring ideas and supporting customer engagement.

Hootsuite	Used for social media management, including writing and scheduling posts, tracking engagement, and performing sentiment analysis. (Generative AI Integration)
HubSpot	Used for lead generation, customer engagement and automating marketing tasks. (Generative AI Integration)
IBM Watson	Used for analysing data, generating customer persona insights and supporting decision-making in customer engagement and business strategies.
Llama	Used to generate creative text content for marketing and branding efforts.
MidJourney	Used for generating visuals, designs and packaging assets, particularly in creative and marketing contexts.
Microsoft CoPilot	Used for content generation and workflow automation, particularly in secure, enterprise-focused environments.
Oracle CX	Used for managing leads and optimising customer engagement through CRM capabilities.
Pencil	Used for generating ad content, testing variations, structuring ideas and enhancing campaign performance in digital marketing.
Salesforce	Used for customer engagement, personalisation and CRM tasks, enabling targeted marketing and relationship management. (Generative AI Integration)
Tidio	Used for managing customer interactions through chatbots, providing automated customer support and engagement.

Wix	Used for creating blog content and enhancing website content, making it easier to manage web-based customer interactions. (Generative AI Integration)
---------------------	---

Table 3: Task-Technology Fit Sub-Theme Code Summary A

These tools encompass a broad range of functionalities, from design-focused applications like Adobe Firefly and MidJourney, which facilitate the creation of visual assets, to content and engagement-driven platforms like ChatGPT and Google Gemini, which enhance text-based content generation.

4.3 Interview Insights: Participant Occupation and Utilisation

The table below provides an overview of the fifteen South African participants interviewed for this research study, detailing the diversity of occupations and their preferred generative AI tools.

Participant no	Occupation	Generative AI Software
Participant 1	Content Marketing Manager	- ChatGPT - Microsoft CoPilot - Llama
Participant 2	Head of Marketing	- ChatGPT - Canva (AI integration) - Hootsuite (AI integration)
Participant 3	UX Designer	- Adobe Firefly - Figma (AI Integration) - ChatGPT
Participant 4	Marketing AI specialist	- ChatGPT - Microsoft CoPilot - Google Gemini - Llama

Participant no	Occupation	Generative AI Software
Participant 5	Business Marketing & Generative AI Specialist	- ChatGPT - Microsoft CoPilot
Participant 6	Head of Marketing	- ChatGPT - IBM Watson - HubSpot (AI integration)
Participant 7	Head of Marketing	- ChatGPT - Adobe Firefly - Google Gemini - Tidio
Participant 8	Head of Digital Marketing	- Salesforce (AI integration) - Microsoft CoPilot - Pencil
Participant 9	Graphic Designer & Illustrator	- ChatGPT - Adobe Firefly
Participant 10	UI Designer	- ChatGPT - Adobe Firefly - Figma AI
Participant 11	Brand Communication Specialist & Copywriter	- ChatGPT - Wix AI
Participant 12	Marketing Portfolio Manager	- ChatGPT
Participant 13	Marketing Manager	- Oracle CX - Microsoft CoPilot

Participant no	Occupation	Generative AI Software
Participant 14	Customer Experience (CX) Design Specialist	- Microsoft CoPilot - ChatGPT - Claude - Miro (AI Integration) - Llama
Participant 15	UX/UI Designer	- ChatGPT - Midjourney

Table 4: Task-Technology Fit Sub-Theme Code Summary B

ChatGPT is the most widely used generative AI tool among participants, with 87% using it in their work. Following this, Microsoft CoPilot and Adobe Firefly are popular choices, used by 40% and 27% of participants, respectively. This distribution highlights ChatGPT's dominant role in the generative AI landscape, with CoPilot and Firefly serving as valuable tools for more specialised tasks.

4.4 Analysis Outcomes: Major Themes and Coding Framework

4.4.1 Findings of Theme 1

The table below explores the alignment of generative AI tools with various marketing tasks under the theme of Task-Technology Fit, explicitly pertaining to sub-question 1:

How well do content generation tasks match the capabilities of generative AI technologies, considering the cultural and linguistic diversity of South African audiences?

Each code represents an application area, accompanied by targeted interview questions designed to gauge the suitability of generative AI for these tasks. The frequency of responses highlights the relative importance or relevance of each application area as perceived by participants.

Theme 1	Task-Technology Fit		
Code	Code Interview question	Frequency (No)	Frequency (%)
Content Creation	How well do the generative AI tools align with your content creation tasks?	67	29.13%
SA Context	Does the task fit the tech in the South African context?	46	20%
Personalisation	How well do the generative AI tools fit your tasks for content personalisation?	40	17.39%
Customer Service	How well do the generative AI tools fit with your tasks for improving customer service?	22	9.57%
Customer Behaviour	How well do the generative AI tools assist in tasks related to understanding and influencing consumer behaviour?	17	7.39%
Customer Engagement	How well do you think the generative AI tools match your tasks for enhancing customer engagement?	17	7.39%
Customer Experience	How suitable are the generative AI tools for tasks aimed at enhancing customer experience?	13	5.65%

Lead Generation	How well do the generative AI tools support your lead generation tasks?	8	3.48%
------------------------	---	----------	--------------

Table 5: Task-Technology Fit Theme Code Summary

The insights reveal that content creation emerges as a primary focus within the Task-Technology Fit theme, with 29.13% of responses emphasising its relevance. This is followed by considerations specific to the South African context (20%) and personalisation (17.39%), which also received considerable attention. In comparison, customer service, behaviour, engagement, experience and lead generation are mentioned less frequently, accounting for lower percentages. This suggests that these areas are comparatively less prominent in participants' discussions of Task-Technology Fit.

4.4.1.1 Content Creation

All 15 participants indicated that generative AI tools are well-suited for content creation tasks and are commonly applied daily across various generative functions in digital marketing. Participants use generative AI for both ideation and creation and further utilise the tools for quality-checking and improving content not made using generative AI. Participants stated that they use various generative AI technologies daily for content creation.

Participant 4 states:

I use generative AI, whether it is Copilot, Google Gemini, ChatGPT, Meta's platform and others daily. I'm in a place where I probably can't do my job without it.

Participants predominantly use generative AI to create digital marketing materials or assets, as described below.

Participant 15 states:

I use it to create packaging. I also use it to help me create backgrounds, just a whole lot of design assets that I usually would pay a lot of money per asset.

Participant 1 utilises generative AI in the creation of text-based marketing:

Teams have used it for everything and anything from: Create a quirky email that will grab attention. Create a social media post that will grab attention. Help me come up with a product name.

Participant 10 utilises generative AI for digital design functions:

I use ChatGPT every single day for reports, user testing, questionnaires, presentations, etc. I use Photoshop AI, which helps with photo manipulation. Then, I also use Illustrator's AI, which helps you make custom graphics and icons.

Participant 10 expanded specifically on photo alterations as a core use of generative AI in their work, stating that the removal of logos or objects in photos used to be time-consuming, manual work, but now generative AI has substituted this process through single prompts, which creates relevant imagery in missing spaces in minutes.

Furthermore, participants spoke about generative AI's application in conceptualisation as part of the content creation process.

Participant 7 states:

It has helped us a lot in terms of conceptualisation... we need to generate a lot of content fast within timelines... it gives you a starting point to go from. So, in that, it has immensely helped our creative process.

Participant 2 builds on the theme of conceptualisation by adding quality assurance as an additional content creation role:

We use ChatGPT for brainstorming and ideation of campaign ideas as well as copy refinement...we would kind of use ChatGPT as a type of creative director... whether that's spell-checking or grammar checking, or checking for inconsistencies. My head of content, my head of CRM, as well as my head of digital marketing, all use ChatGPT in some shape or form.

Participant 3 also confirms the quality assurance role concerning user experience tasks:

I've been using a bunch of Figma's AI tools, specifically with wireframing. Generative AI has helped us broaden our spectrum of solutions we would normally consider.

Furthermore, participants expanded on content creation tasks that were not directly related to creating actual assets.

Participant 6 says:

If I must draw up a marketing plan, I will say, please write this as a marketing specialist in the tech environment. It needs to include points A, B, and C. Make sure it's professional. I've learned that I must give very clear instructions and the persona and the tone of voice is very important... So, from version one, I will make it more specific, and we usually take four to five takes.

The interviews confirmed the many ways in which participants utilise generative AI for content generation.

4.4.1.2 South African Context

In the South African context, participants perceive the technology as lacking in terms of task-tech fit, particularly regarding authenticity. Among the 15 participants, 80% shared somewhat negative views, although they acknowledged its potential for growth in the future.

Participant 5 states:

I think it's missing authenticity. We, as Africans, are very authentic, right? From a South African perspective, if I found an AI that said, Howzit to me? I'd be like, Oh, this is a local boy, right? Just that authenticity that grows. And what I believe is missing.

Participant 4 reinforces this belief:

Another big challenge is African languages. We have about 3000 different languages and dialects on our continent, and it is massively underserved by these platforms that we use. And there are a number of our universities and local organisations doing great work, because we have to create these data sets from scratch, whether it serves Zulu or Xhosa or Afrikaans and so forth. Now, for instance, ChatGPT is fairly good at translating. It blows my mind how good it is, but it doesn't pick up my sentiment because, in every culture, there are certain words that we use that indicate a level of frustration, arrogance, interest in buying and so forth that you can't just ChatGPT. So, the potential for this tech is immense, but I see almost no organisation using it because their data is in such a mess.

Participant 7 eluded to the responsibility of the user to provide the necessary data for authenticity:

I think it's a bit more lacking. There is a bit of a barrier in terms of language and personas, but I think you need to put in the work to train the AI to give you the specifics that you need.

Participant 3 shared this belief about African data scarcity:

I think that it has its biases. It is quite biased towards especially America, but I would say that it would need to be fed more African content for it to be truly usable in the biosphere that we are in.

While participant 11 expressed very negative feelings toward its authenticity:

It's not yet close to where it could be for a South African audience. I actually used some video-gen tools a few months ago. I wanted to see what it would do with South African content by turning it into a video, and I tried it, and it was shockingly bad.

Overall, participants believed that generative AI lacks the data or knowledge to create authentic South African content truly.

4.4.1.3 Personalisation

Among the 14 participants who discussed personalisation, opinions on generative AI's ability to personalise content were mixed. Overall, there was a positive perception of its task-tech fit, with 71% expressing favourable views on its personalisation capabilities. A significant subtheme was a concern about authenticity (29%), which was also reflected in the code related to the South African context above.

Participant 5 stated that they see a lot of potential for personalisation regarding the technical ability of generative AI technology:

Here's customer X. He's been planning a wedding for some time. Guess what? Let's make this advert. Generative AI, send this core message to this type of client who's busy planning a wedding, who has two children, who is in love with his wife today because he's just sending her flowers for no reason. Now you're catching me today, right? That's the power that it has in marketing.

Participant 4 reinforced this sentiment by emphasising generative AI's technical potential for personalisation if provided with enough data:

We talk a lot about hyper-personalization and it has to do with if you have enough information about me as a customer. So, I am a user, but I am a male. I'm of a specific age and ethnicity. This is the history of my interactions with you as an organisation. This is my geography. I'm a parent or not, etc. For instance, if I'm a 20-year-old, you might want to answer with: Hey, dude, how you hanging? These are opening hours. Now, if I'm a 60-year-old investor, you certainly don't want to do that. You know exactly what are those key words that will sway my opinion, to get me to buy that product, to make that booking? The technology is there.

Participant 14 builds on this sentiment by linking its personalisation potential to lead generation:

Because it's built into AI to do that big data analysis, it will help with warmer lead fulfilment, as well as that personalisation, so you are no longer just talking to a mass market and then hoping that someone just relates to that message. Generative AI would also allow you to... customise and personalise the message for that person to convert.

While many participants recognised its potential, only Participant 7 confirmed the impact on personalisation.

We have utilised IBM Watson AI to give us a range of personas. So we are feeding it with data that we have, also social data and then contextual data that we are layering over one another, and then it is giving us personas that we can target specific segmentations with products. So, it's a really helpful tool in terms of personalisation and getting to the target market that you really want.

Yet, some participants are still wary of its application in this regard.

Participant 2 states:

For me, because of that issue of authenticity, at this stage, I am only comfortable using AI to identify or facilitate the way we personalise, but not the messaging itself. So, what I mean by that is helping us identify what aspects we can personalise and how we can personalise it. But I'm not comfortable using generative AI for the actual messaging that we need there, and it comes back to the authenticity.

It is evident that participants do perceive the technology to be able to fulfil this function; however, due to authenticity concerns, its impact is perceived to be limited.

4.4.1.4 Customer Service

Among the ten participants who discussed customer service, 80% described generative AI as a good fit for this task, provided that the language models are adequately trained and ideally supported by a human in the loop. Only 20% of participants felt that generative AI was not helpful in this area.

Participant 2 states that generative AI is an excellent tool for knowledge-based management but not for direct customer support:

We definitely use AI to check, validate and to enrich that customer knowledge base information. I just need to reiterate that there's always human intervention. We have no workflows where there's an automated customer engagement, that is just facilitated by AI.

Participant 4 reinforces this sentiment but eludes to more promising use cases:

If you use generative AI from a chatbot point of view, the use cases are incredible, and it can be autonomous and without a human in the loop, although I do think there should always be an aspect of a human in the loop. The use cases are immense.

Participant 6 shared a personal experience that also reinforces the above sentiments:

In my own experience, if I'm on Company X's website or app, and this bot pops up, and I just want to speak to a person to guide me, and this bot keeps redirecting me to another question and another question, and at the end of the day, me and this bot had this long conversation. So, I think it goes both ways. It can. You can utilise it for a lot of frequently asked questions, but you still need the option for your customers to get service in person.

Participant 14 did, however, highlight the effectiveness of their customer-facing and employee-facing chatbots:

I think it's a perfect match when it's trained properly. I know that there's teams currently looking at creating isolated LLM models using our own databases, our

own reference material, our own processes, based on that the fulfilment of tasks will come in.

It is evident that the technology is seen as a good fit for this task, but most participants believed that a human in the loop is the best approach to customer service in conjunction with the technology.

4.4.1.5 Customer Behaviour

All 10 participants who discussed customer behaviour expressed a positive view of the fit between generative AI and understanding customer behaviour. The remaining participants have not yet utilised generative AI for this task.

Participant 2 explains the benefits of their generative AI recommender tool and describes it as a promising technology fit:

The one specific type of AI intervention we do have on our site is a tool called the recommender engine, which is a kind of plug-in facilitated by our agency that manages our booking engine. But what that tool basically does is track consumer behaviour on the site, and suggest content related to that user journey. So, it's just a nice way to enrich the user journey based on actual actions and behaviour being taken on the site, to help drive the conversion, but at the end of the day, also to provide the customer with more information and an enriched experience.

Both Participant 6 and Participant 8 confirmed the technology fit between their chosen generative AI software and customer behaviour:

Participant 6 elaborates on HubSpot:

Referring back to HubSpot, knowing where people click, or where they engage, or putting up triggers, and through those triggers, pushing content because they clicked on a certain trigger, yeah, so I think definitely yes.

While Participant 8 highlights Salesforce features in this regard:

Salesforce is a good platform where you can do some really cool user-centred journeys that you can build out very intricately. It just obviously takes a bit of time and effort to kind of get that across the board, considering that it's still HTML-based, but there are some really funky things you can do with Salesforce.

All participants communicated the value of generative AI regarding customer behaviour and felt that the technology was well suited to the task, making this aspect one of the best recorded in this study.

4.4.1.6 Customer Engagement

All 10 participants who discussed customer engagement held a favourable view of the task-tech fit between generative AI and customer engagement. The remaining participants have not yet utilised generative AI for this task.

Participant 6 spoke about generative AI's potential regarding persona creation in this regard:

We are currently sitting with a company that will help us to create personas for different target markets in our sector, and through this generative AI, they will help us create and present ads for these different segments, which makes it fast. It's not manual. We are doing AB testing through it, and I think if that is successfully implemented, we will see the custom engagement peaking.

Participant 7 echoed this sentiment:

We are using AI to create persona-based segments, and using that tool and the information it gives us to make personas and to market directly to those personas in the tone of voice that they would like, in the visual imagery that they would like, and also the products that connect to that market.

While Participant 10 specifically highlighted the role of an LLM like ChatGPT in crafting better customer engagement:

I do some user testing that relies on customer engagement. So for that, mainly, I use ChatGPT to help me to phrase the questions in a way that is understandable for the user. So I think in that sense, the tech helps a lot with how we approach the user, and the types of questions we ask them.

All participants echoed the good task-technology fit concerning generative AI and customer engagement, making this aspect one of the best features recorded in this study.

4.4.1.7 Customer Experience

Of the 10 participants who discussed the task-tech fit for customer experience, all but one expressed an optimistic view, emphasising the technology's potential for future growth.

Participant 7 offered the only negative feedback, mentioning language barriers as a concern, which connects to the challenges outlined in the South African Context code.

Participant 2 discussed the great potential of generative AI but stated that they had only begun this initiative, and findings remain to be seen:

When I'm thinking UX and UI, a big part of our customer journey is our website, and where online bookings happen. So, that is a vital part of the user journey. And there's a lot of UX and UI components to optimising that journey, both to ensure that it's as seamless as possible, and we're driving the highest possible conversions, because, at the end of the day, we are a business.

Participant 7 also saw the potential for task-technology fit to enhance customer experience but found it lacking:

I have found that AI has made it possible for us to personalise customer experience, but within a specific target audience, and the barriers that we have in terms of language and context, that fit is not really there yet.

Overall, participants expressed excitement regarding the task-technology fit that is believed to improve customer experience. However, not many could provide tangible benefits yet. This aspect seems to be in the initial stages of testing for the majority.

4.4.1.8 Lead Generation

Notably, only 7 participants (47% of the total) discussed lead generation AI, highlighting a limited level of engagement with this application. Those who did address it expressed optimism about its future potential.

Participant 7 was one of the participants to highlight the practical application of generative AI and its impact on lead generation:

In terms of target market segmentation, generative AI plays a big role in the content that we create for lead generation. We use generative AI in specific points of the process, but tools like HubSpot or Facebook marketing, they have their own built-in AI to assist us in the process of lead generation.

Similarly, Participant 14 spoke about the value of generative AI in curating warmer leads:

Lead generation is who will convert and who will not. That's the biggest issue. So you can have a very big lead input, but if only one or two convert thereof,

then it's a very expensive lead generation funnel. What AI helps us with is to track that behaviour and understand you might have a lot less leads coming in, but your leads a lot more warmer, because it tracks multiple sentiments across a journey.

Though few participants could speak to generative AI's application to lead generation, those who did mention it reported a very good task-technology fit.

4.4.1.9 Theme 1 Summary

In conclusion, the Task-Technology Fit of generative AI in the South African digital marketing context is perceived by participants as promising but nuanced. Content creation emerges as the primary application, allowing marketers to create, ideate and refine content and streamline production processes. However, the technology's limitations in capturing local authenticity and linguistic diversity are perceived as challenges, particularly in South Africa.

While generative AI has strong potential for personalisation, customer service, and behaviour analysis, its effectiveness often depends on careful human oversight to maintain authenticity and relevance. Overall, generative AI is perceived to offer substantial value, specifically regarding customer behaviour, engagement and experience. However, optimising its use by South African digital marketers will require adaptations to better align with cultural and contextual needs.

4.4.2 Findings of Theme 2

The table below presents insights into the theme of Utilisation, focusing on how well generative AI tools meet various functional requirements. Each code represents specific aspects of software utilisation, supported by interview questions that capture participants' perspectives, explicitly pertaining to sub-question 2:

How does the perceived Task-Technology Fit affect digital marketers' use of generative AI?

Theme 2	Utilisation		
Code	Code Interview question	Frequency (No)	Frequency (%)
Capability	To what extent do your generative AI tools meet your functional	54	24.66%

	requirements for various content-generation tasks?		
Quality	How does the quality of AI-generated content influence your decision to use generative AI tools in your content creation process?	42	19.18%
Timeliness	How do the speed and responsiveness of generative AI tools affect your usage when generating content?	42	19.18%
Ease/Training	How user-friendly are the generative AI tools, and how sufficient is the training provided for effectively using these tools?	27	12.33%
Compatibility	How well do generative AI tools integrate with your existing systems and workflows for content creation?	23	10.50%
Authorisation	How do generative AI tools' security and access control mechanisms impact your usage of these technologies?	12	5.48%
Relationship (Support)	How do the quality of support and interactions with AI tool providers influence your usage of these technologies?	10	4.57%

Reliability	How consistent and dependable are your generative AI tools in your content creation processes?	9	4.11%
--------------------	--	----------	--------------

Table 6: Utilisation Theme Code Summary

The insights from participants indicate that capability is the most prominently discussed aspect of utilisation, with 24.66% of responses focused on how generative AI tools align with functional requirements. Quality and timeliness are also significant areas of attention, each accounting for 19.18% of responses, underscoring their relevance in participants' discussions.

Ease of use and training (12.33%) and compatibility with existing systems (10.50%) receive moderate focus, highlighting their importance in tool utilisation. In contrast, security and authorisation (5.48%), support and relationships with providers (4.57%), and tool reliability (4.11%) are less frequently mentioned, suggesting these aspects are comparatively less prominent in discussions on utilisation.

4.4.2.1 Capability

13 out of 15 participants (87%) described generative AI as capable of performing the tasks it was chosen for. However, a subtheme emerged indicating that its effectiveness relies not only on the software's capabilities but also heavily on the quality of user inputs.

To this point, Participant 2 states their opinion regarding generative AI's capability:

It's very, very capable. The thing about AI technology in general, with these tools, they're constantly improving. No tool is perfect, but I think for the reason and the way we use it, it completely meets our needs.

Participant 3 echoes this sentiment specifically in the context of user experience design:

I think it's very capable. Specifically in the field of UX, it's very capable. For example, we love using ChatGPT. I think large language models are insanely powerful to use.

On the other hand, Participant 6 believes that its capability is subject to review:

I think it's very capable in the sense of data and resources, but you still need to check it. We are in a generation that have the theory and we have the practical experience. So, for ChatGPT, I will instantly know if he's lying to me.

Participant 9 agrees with Participant 6 and stipulates under which circumstances it is perceived to be capable:

I would say it is definitely capable to improve and expand on what I have already created. I'm still a bit sceptical about generating something from scratch, and it just doesn't come out the way that you envision.

Participant 10 finds its capability subject to prompting and prone to error:

I think there's still a lot of improvement that can happen there. If you find the right prompt, then it does what you want exactly. But most of the time, it's a bit of a trial and error to get it to do what you want it to do.

Participants 11, 15 and 1 echo this sentiment but focus more on the quality of the input as a determining factor regarding capability.

Participant 11 says:

I think it is quite capable. However, it all depends on what I input into it.

Participant 15 builds on this idea:

That kind of depends on the user using the tech. I think it has a ton of capabilities... as people use it, the tech also learns how people are asking it questions and what they expect from those answers. It's like symbiosis. Both humans and AI learning from each other. To answer that, I think it all depends on how capable the human is.

In conclusion, Participant 1 solidifies this sentiment:

They're capable, the prompt engineering is important. The more skilled you are at asking the tool and understanding the steps it probably takes to compute, means you're either spending good time on generative AI or wasting time.

Participants generally believed the technology to be capable, depending on the quality of the human input.

4.4.2.2 Quality

9 out of 15 participants (60%) rated the quality of generative AI output positively enough to consider using the tool again. In comparison, forty percent saw quality as a barrier to further use. Participants mentioned issues such as hallucinations in language models and repetitive

content, which discouraged them from using the tool. However, a noteworthy subtheme emerged, highlighting that the output quality is closely linked to the quality of user input rather than solely to the technology itself. All participants expressed an understanding of the role and impact of the user on the quality of the generative AI output in correlation with the previous section's findings on capability.

Participant 2 establishes this point of view by highlighting the importance of good human input:

Quality is never a problem because the base content is coming from a human that has been pre-vectored as having great quality. So quality, to be honest, is not an issue for us.

Participant 4 reinforces this perspective but discusses the other side of the coin:

A lot is up to how mature you are in your prompting skills. Most people I deal with, especially my customers, they really struggle with getting quality information back because they don't know how to prompt.

Participant 12 further builds on the value of the prompt:

I think the output is what you put in, right? So, in terms of the prompts, that's very important for you to exactly prompt it in a manner to get what you are looking for.

Participant 8 agrees but shines a spotlight on another challenge:

One of the biggest issues is the echo chamber. It's referencing its own ads and other generative AI ads to build on. But the main thing for me is input.

Participant 11 reiterates this belief and expands on this in the context of text-based marketing:

It's very predictable in many respects, and we know certain words come up all the time, so I'm glad I know that because I'm able to edit it and change the wording.

Participant 15 confirms this phenomenon and reiterates the input quality as the primary solution:

The more you fine-tune it, the better the quality is. You need to be smart as to how you ask the questions. So, if you just type in random few words, the case is that most other people will receive the same image.

Participant 14 adds another threat to quality to this problem which directly impacts utilisation:

It does hallucinate sometimes. So, from a quality perspective, some (technologies) are just more accurate than others. And when it comes down to quality, when there's a break in quality, we definitely kind of avoid it in the future, because you don't always have the capacity to just go back and check something.

4.4.2.3 Timeliness

11 out of 13 participants (85%) responded tremendously positively to the speed and responsiveness of generative AI. In contrast, only two participants found it lacking quality output and, therefore, negatively described its timeliness as multiple prompts were necessary.

Participant 15 reflects on the amount of time saved through generative AI use:

Literally, a week's worth of time that gets saved. So, for example, I can do 12 artworks for our range of product X, in a single day, and if I had to actually go and illustrate that, or Photoshop that into something, or take pictures and mesh that, it would have taken two or three months.

Participant 9 builds on this perspective and establishes this feature as the reason for continued use:

It is super quick. It happens really fast. And then it gives you multiple options that you can choose from. It does save a lot of time. So, I definitely do use it to save time and because of that, I would say I'd use it every day.

In conclusion, Participant 6 confirms massive time saving as a key utilisation factor.

It would have taken us about eight months, because we had to go and get all the information, do the research. We will have to know how the ad would look for the age group between 19 and 23 and 30 to 40. So, with the software, it does it in an instant. We are personalising the content, the message, the designs, segments and instant evaluation, instant rerouting.

The majority of participants perceived generative AI to have a positive impact on marketing tasks concerning timeliness and stated that this factor played a key role in their continued use.

4.4.2.4 Ease of Use/Training

9 out of 12 participants (75%) expressed positive opinions about the ease of use and the training available, while 25% felt this aspect could have been further improved.

Participant 14 points out that the technology in and of itself provides conversational training:

For a standard user, because it's conversational UI-based, it's a normal chat-based interface. And if you don't know what to do, you can just ask the thing to help you, guide you.

Furthermore, Participant 10 highlights the multiple video learning opportunities which improve utilisation:

The software companies do have demonstration videos that's on YouTube. So, usually I'll go watch the demonstration video, and then it's quite easy to use.

Another key training opportunity is the onboarding process as described by Participant 3:

I've gone through some amazing onboarding processes when using generative AI. I think that the developers and the software engineers really saw that people are going to struggle with this and acted pre-emptively.

Finally, Participant 1 describes a company-wide generative AI training programme that this individual facilitated and highlights its impact on utilisation:

I'd consider myself an early adopter, because this tech is amazing and what I believe strongly in is that people learn and understand these tools. I literally took them through examples of what you can do, the type of outputs, and then a couple of weeks later, I checked in and there's huge inertia to overcome in getting people to try something that's unfamiliar.

Participants generally perceived generative AI software to be user-friendly and expressed that they had experienced sufficient training in various formats as illustrated above.

4.4.2.5 Compatibility

10 out of 14 participants (71%) stated that generative AI integrates seamlessly into their systems, indicating high compatibility. However, the remaining 29% identified obstacles to compatibility, primarily due to company authorisation processes and legacy systems, which suggests these challenges are not directly related to the generative AI software itself. The authorisation code, detailed in the next point, is a central issue connected to this compatibility concern.

Participant 1 establishes generative AI's compatibility and highlights its design as a key factor:

I'd say pretty compatible because of the way that it's been integrated into our IT landscape. We all have access if we log in a certain way. They're designed to integrate seamlessly so that people use them, because that's how they learn and grow.

Participant 2 echoes this sentiment:

It's integrated into the tools. It's integrated into the licensing that you're already paying for. And it's, it's a seamless experience, as if it's part of the overall offering. So, there's no concern there.

However, Participant 15 notes that legacy systems are a challenge concerning utilisation:

We have a lot of legacy systems, so we have a lot of technical debt, so there are systems that they still need to discard. So, compatibility, I'd say 60% because there's reinvestment into new technology.

Overall, participants perceived generative AI to be generally compatible, and especially compatible where seamless integrations were already built into the software.

4.4.2.6 Authorisation

Notably, only 47% of participants had insights regarding authorisation, as it was not a relevant factor for the others. Among this group, 71% reported challenges with company authorisation, limiting their choice of generative AI tools, while 29% indicated sufficient authorisation to use these tools.

Participant 12 illustrates a practical example where a company restriction is limiting utilisation:

I think just from a work perspective, there are restrictions of loading data on it, and obviously now we're crossing the lines with business IPs, data sharing and all of that. So, I think for those who are not restricted with how they share data with the AI tool, it can definitely create customer journeys.

Participant 13 paints an even harsher picture saying that the company has banned ChatGPT:

It's actually been banned from two months ago. You can't go on Company X right now and dial ChatGPT. It's been banned because of the risk associated with generative AI getting company IP, because a lot of these kids would pay that \$20 subscription and upload an entire business presentation or business case, which is a risk to the business.

Luckily, Participant 4 presents a solution that they see in practice, especially in the banking sector:

What I do see happening at the moment is what I call internal ring-fenced large language models because open AI and Google Gemini and others are open models. You cannot trust what you put in there, even though the power is amazing. AWS is doing this. Microsoft and others are doing this where it's only your business data ring-fenced from a security point of view.

Authorisation does not seem to be a prominent challenge among the majority of participants, however, for those with company restrictions, the limitations are severe.

4.4.2.7 Support (Relationship)

9 out of 15 participants (60%) discussed the support available for generative AI, while the remaining participants found it irrelevant to their experience. Of those who spoke about it, 56% expressed a positive opinion, noting that they often didn't require additional support due to the technology's built-in solutions. However, a few participants raised concerns about the level of support provided.

Participant 13 expressed the most dissatisfaction:

That was a big problem because when things break, you usually have your war rooms. You do not leave until it's solved. We call it boiler meetings. Sometimes you're in a boiler for up to three days, trying to fix it, and you're online, sitting with whichever service provider and we're trying to resolve it. So that is a big problem for me.

The rest of the participants did not need support outside of the software's built-in assistance as described by Participant 7:

I must say, in Adobe, I have asked a lot of questions for support, mainly because it was kind of glitchy, but then there's Adobe Firefly that you can just prompt and it gives you something, so I haven't really reached out to get support from those tools.

Participant 15 has found another workaround eliminating human support:

I just go to their GitHub publication, or the API published documents, and then I just search for whatever needs to be searched. I think people using it these

days are very tech-savvy as well, so if they can follow that, it completely cancels out the need for person-to-person support.

The impact that support has on generative AI utilisation seems to be very little, as most participants actively avoid human contact and rather access built-in software support or online archives for this requirement.

4.4.2.8 Reliability

Reliability emerged as a concern for only 33% of participants, who viewed it as a prominent factor in utilising generative AI. Within this group, 60% considered the software reliable, while 40% expressed concerns about its reliability in the absence of human oversight. While reliability was not a primary focus for the majority, many participants referenced quality in connection to reliability.

Participant 9 says:

It is quite reliable. I'd say there's maybe been once or twice where it generated something that I couldn't use at all, like it wasn't even just a little bit off, so 90% of the time, it's very reliable,

However, Participant 3 has doubts regarding reliability and calls for human intervention:

I would say reliability wise, it still needs that human input. I would not, for example just copy and paste from an AI system into live data. I'd rather put it through some human processes and test it also. I wouldn't necessarily just trust it at face value.

The majority of participants still perceived it to be reliable and therefore confirmed that this factor had a positive impact on its utilisation.

4.4.2.9 Theme 2 Summary

Overall, participants emphasise the strong functional capabilities of generative AI as the primary reason for its frequent utilisation, with most finding it capable of meeting their needs, provided the input is well-constructed. Quality and timeliness are also highly valued, as participants appreciate the speed and responsiveness of AI, though they sometimes encounter issues with the accuracy and relevance of outputs.

Ease of use and training, along with compatibility with existing systems are moderately important, highlighting the necessity of intuitive interfaces and seamless integration for optimal

utilisation. Security and authorisation are mentioned less frequently but indicate concerns about data privacy and the limitations imposed by organisational policies.

Support and reliability, while not primary considerations, show that while AI is generally dependable, there remains a need for occasional human oversight to ensure consistency and accuracy. When considered collectively, the factors which most contribute to utilisation are capability and timeliness, which received the highest percentage of positive feedback.

4.4.3 Findings of Theme 3

The table below explores insights related to the theme of Performance Impacts, examining how generative AI tools influence effectiveness, efficiency and productivity in digital marketing tasks. Each code represents a key area of performance guided by sub-question 3:

How does the perceived impact of generative AI affect the performance of digital marketers in their content creation processes?

Theme 3	Performance Impacts		
Code	Code Interview question	Frequency (No)	Frequency (%)
Effectiveness	In what ways have generative AI tools increased the effectiveness of your marketing content, particularly in terms of relevance, personalisation and customer engagement?	69	50%
Efficiency	How have generative AI tools streamlined your content creation process and reduced the time and effort required?	50	36.23%
Productivity	How have generative AI tools enabled you to improve overall performance improvements in your marketing efforts?	19	13.77%

Table 7: Performance Impact Theme Code Summary

Effectiveness emerges as the most frequently discussed aspect within the Performance Impacts theme, with 50% of responses addressing the role of generative AI in shaping content relevance, personalisation and customer engagement. Efficiency is also prominently mentioned, making up 36.23% of responses, highlighting considerations around streamlining content creation and reducing time and effort. Productivity appears less frequently, with 13.77% of responses indicating that it is comparatively less prominent in participants' discussions on performance impacts related to generative AI.

4.4.3.1 Effectiveness

75% of participants viewed the effectiveness of generative AI tools highly favourably, though many acknowledged that human input is still necessary to maximise their potential. In contrast, 27% felt that the effectiveness of the tools remains limited.

Participant 12 says:

I think the level of effectiveness is very high.

This perspective is widely held by participants in general, as illustrated in the quote below from Participant 13:

I'd say it's highly effective. I think being in a range of at least 85%, where we are still seeing a massive saving.

Participant 15 reinforces this perspective but adds that human skills are still invaluable:

I would say 80, 85% because there's just some things that I wanted to do, and it's just not hitting it, and then I revert back to the skills that I have.

Participant 5 builds on the above position of human involvement:

The effectiveness is how well something is done. I would still fail AI on some exams, right? It still needs a human to look and to say: Does this make sense? So, on effectiveness, I think that's where it's probably lacking the most, behind efficiency and productivity.

This is a view also held by Participant 1 who is more optimistic about the future:

I think effectiveness and generative AI tools is a work in progress. I wouldn't say we're quite there yet. Everything that's created through generative AI still

absolutely needs human oversight and human input. So as far as effectiveness goes, marginal benefits there, probably to become far bigger in the near future.

The majority of participants believe that generative AI is effective in the output that it produces and though the need for human intervention is widely expressed, human involvement does not take away from the level of effectiveness. Generative AI is perceived to remain a tool for utilisation rather than replacement at the time of the study.

4.4.3.2 Efficiency

All participants unanimously valued efficiency as a key benefit of using generative AI, with each of the fifteen respondents reporting significant gains in efficiency across their work tasks.

As Participant 2 so accurately states:

The entire team's efficiency is increased by the use of AI when it comes to generative purposes. And, like I said at this stage, with the requirements and the expectations on the team, without that AI support, my team would feel insufficient. I would definitely need increased headcount to be able to manage that workload, but AI takes a lot of that pressure away from us.

Participant 3 echoes this sentiment by reflecting on the reduced time of marketing efforts:

I think that it has made us more efficient. It has reduced the amount of time you spend on stories, reduced the time we get to solutions. Definitely, it has resolved conflict in the past. So, I think it is a well-established tool that is definitely sparing us a lot of time.

Participant 6 accounts the time saved generating content:

What should have taken us eight months, it came down to two months. So definitely streamlining and faster.

The praise continues with Participant 7 highlighting specific manual tasks that have been completely eliminated:

It saves so much time, especially in imagery. Hair is very hard to deep edge and edit out, whereas now you just drag a selection box, you click the button, and it fixes it for you. It's wonderful. It saves so much time. Very, very efficient!

Participant 12 agrees and closes the discussion with a final statement on the subject:

There's no denying that the tool itself is super effective and efficient in what it does.

Every participant held efficiency in the highest regard concerning the performance impact of generative AI. It is, therefore, the leading performance impact of this study.

4.4.3.3 Productivity

All participants also highlighted productivity as a major benefit of using generative AI, with each of the fifteen respondents reporting noticeable improvements in productivity across their work tasks.

As illustrated in this definition of productivity, Participant 3 establishes the value of productivity gains in their context:

We measure productivity in the quality of our solutions, not necessarily the time spent on the solution itself. That's our methodology. So, when we do use AI, our productivity does increase because the quality of our work increases.

Following another approach, Participant 5 accounts for the percentage of increase in productivity to position their statement:

We saw it at Company X. We had a 40% increase in productivity. We had two associates on the same level. One was using ChatGPT, and the other one wasn't, I imagine 40% productivity on one person. So, if you can increase that productivity by 40%, it literally means that, the business case speaks to the redeploying of 40% capacity to other places.

Participant 9 uses a practical example to highlight why they believe generative AI tangibly increases productivity:

You have more time to experiment and improve on work that you usually would have only had an hour for, whereas you now suddenly have 40 minutes extra, where you can either get more done or start a new project. So it does make a real difference in productivity.

In conclusion, Participant 1 expands on the popular opinion among participants regarding the productivity increase in mundane tasks:

On lower level projects that don't require as much thought, I would say productivity gains there are high, so the time saved there can then be used on

more cerebral work. So there is definitely a benefit to getting that time back and then being able to apply it to more strategic thinking, deeper level work.

Every participant believed productivity gains due to the use of generative AI greatly impacted their performance. If it were not for the challenges with quality output reducing productivity, it would be an equal leader in performance impacts. However, among the three indicators, efficiency arises as the highest-regarded impact on performance, according to the interview data.

4.4.3.4 Theme 3 Summary

Generative AI is perceived to deliver substantial benefits in digital marketing, with efficiency and productivity as the major gains. Participants highlighted how AI significantly reduced task completion times, allowing teams to handle larger workloads without the need for additional resources. Projects that previously took months to complete were now completed in weeks, freeing up valuable time for strategic work.

This boost in efficiency also translated into higher productivity, as generative AI, enabled teams to improve both the quality and quantity of their output. With routine tasks streamlined, teams had more time to focus on creative and complex projects, ultimately enhancing overall performance.

Effectiveness, while positively rated, lagged slightly behind. Participants estimated AI's effectiveness around 80-85%, acknowledging that human oversight is crucial to achieving desired outcomes. While generative AI has strong potential, it works best when combined with human expertise, with room for further improvement as the technology matures.

4.5 Conclusion

Chapter 4 explored the integration of generative AI in digital marketing by examining its Task-Technology Fit, Utilisation and Performance Impacts, providing insights into how South African digital marketers use and perceive this technology.

Regarding task-technology fit, generative AI aligns well with core digital marketing tasks, particularly in content creation, customer engagement and personalisation. This fit is evident as tools like ChatGPT, Adobe Firefly and Canva enable marketers to streamline workflows and enhance creativity in their content outputs. However, the need for cultural and linguistic adaptation within the South African context has been noted, suggesting that further localisation could improve the relevance of AI-generated content.

In terms of utilisation, generative AI tools have found broad applicability, with participants leveraging them to automate repetitive tasks, enhance creative processes, and manage customer interactions. The chapter highlighted that while these tools are generally perceived to be effective and user-friendly, their utility often depends on the quality of user input. Participants emphasised the importance of well-constructed prompts in generating reliable output.

Finally, looking at performance impacts, generative AI has notably boosted performance by enhancing efficiency, effectiveness and productivity. Participants report considerable reductions in task completion times, freeing resources for more strategic activities. While generative AI enhances productivity and content quality, effectiveness still requires human oversight to meet high standards in engagement and personalisation. This blend of AI with human expertise has shown potential for meaningful performance improvements within digital marketing.

To summarise, Chapter 4 illustrates that generative AI offers substantial value to South African digital marketers, improving task fit, broadening functional use and positively impacting performance metrics. These findings set a strong foundation for further analysis in Chapter 5, where these preliminary insights can be examined in-depth to explore the strategic implications of generative AI adoption in the digital marketing landscape.

CHAPTER 5 – DISCUSSION OF FINDINGS

5.1 Introduction

The study examined the utilisation of generative AI by South African digital marketers, focusing on understanding how they employed this technology during the peak of the inflation stage, as identified by Gartner (2024). Grounded in the conceptual framework introduced in Chapter 2, the analysis investigates the role of generative AI in content marketing using Goodhue and Thompson's (1995) Technology-to-Performance Chain (TPC) model and Gupta et al.'s (2024) Seven Areas of Impact Framework. These frameworks provide a structured approach to evaluating the alignment between generative AI tools and the tasks performed by digital marketers, the level of their adoption, and the resulting impacts on performance. Central to the study is the main research question: *How do South African digital marketers use generative AI for content generation?*

5.2 Task-Technology Fit

This section addresses research sub-question 1 on Task-Technology Fit by evaluating how effectively generative AI technologies support content creation tasks. The analysis is guided by Gupta et al.'s (2024) Seven Areas of Generative AI, with a particular emphasis on the adaptability of these technologies to South Africa's unique cultural and linguistic diversity.

5.2.1 Research Sub-question 1:

How well do content generation tasks match the capabilities of generative AI technologies, considering South Africa's cultural and linguistic diversity?

5.2.1.1 Generative AI as a Content Creation Tool

All participants confirmed using generative AI for various content creation tasks, including brainstorming ideas and developing several digital marketing assets, including text, images, video and audio. As established in Chapter 2, generative AI is perceived to be a disruptive technology in content marketing, significantly aiding in content generation (Gartner, 2024). Many participants also relied on these tools to quality-check and enhance content created through other means. Drawing on interview insights and aligned with the TPC model (Goodhue and Thompson, 1995), generative AI demonstrated a strong task-technology fit, with all participants affirming its suitability for these purposes.

5.2.1.2 The Need for African-Centric Generative AI

Despite its utility, cultural and linguistic limitations emerged as significant challenges. The majority of participants expressed frustration with generative AI's inability to represent South African languages and cultural nuances authentically. They noted that AI-generated content often struggled with local languages, such as isiZulu or Afrikaans, resulting in outputs that felt inauthentic to their target audiences. This lack of localisation was identified as a barrier to effectively engaging diverse customer bases. Participants emphasised the need for African-centric generative AI models trained on localised datasets to enhance contextual relevance and authenticity. This perspective aligns with Nasila's (2024) assertion in Chapter 2 that Africa must develop bespoke AI solutions to address the continent's unique needs and challenges. The task-technology fit is, therefore, weakened due to its cultural limitations.

5.2.1.3 Personalisation and Authenticity

Generative AI's potential for personalisation was recognised by the majority of participants as a transformative tool for enhancing customer engagement. Tools like HubSpot, Salesforce, and ChatGPT were praised for their ability to create tailored messaging based on customer behaviour and preferences. However, the relationship between personalisation and authenticity emerged as a critical concern. Participants noted that while AI facilitates personalised content delivery, the absence of authentic cultural context can make the output feel robotic and disconnected. The interviews underscored the importance of pairing AI-driven personalisation with cultural sensitivity to maximise its *impact*, a perspective also supported by Nasila (2024). *The task-technology fit is therefore weakened, relating to the need for African-centric generative AI.*

5.2.1.4 Customer Service and Human Oversight

Participants also explored the role of generative AI in customer service, particularly for automating responses and improving response times. Most participants utilising the technology for this purpose reported favourable outcomes using AI to handle routine customer queries through chatbots or automated email systems. This aligns with Gupta et al.'s (2024) findings that generative AI can enhance response times by automating lower-level customer service. However, all participants stressed the importance of a human-in-the-loop approach to address complex issues and maintain a personal touch. Participants observed that generative AI was very suitable for FAQs, but human intervention is critical to maintaining trust and satisfaction regarding nuanced customer concerns. The task-technology fit is, therefore, reasonable, but

while the technology excels in automating and enhancing routine tasks, the oversight provided by humans is essential for optimising its potential. This complementary relationship between generative AI and human oversight highlights the evolving role of generative AI as a valuable tool rather than a standalone solution.

5.2.1.5 Customer Behaviour, Engagement and Experience

Participants expressed positive perceptions about the impact of generative AI on customer behaviour, engagement and experience, with all participants recognising its potential to enhance engagement rates, improve customer experiences, and enable dynamic tracking of customer behaviour. This is reflected in Gupta et al.'s (2024) research in Chapter 2, which found that generative AI can deliver real-time personalised interactions through personalised content delivery by analysing past customer interactions and real-time behaviour.

Participants did not doubt the potential of generative AI in this regard. However, many admitted they were still in the experimental phase, learning how to utilise AI's capabilities completely. While early findings appear promising, participants acknowledged they have yet to master the technology. Those who successfully implemented it reported a strong task-technology fit, highlighting significant benefits already realised and the potential for even greater gains in the near future.

5.2.1.6 Lead Generation

According to Gupta et al. (2024), generative AI shows immense promise in qualifying leads and improving lead quality. However, most participants had not yet successfully leveraged generative AI for this purpose. Less than half could comment on its impact, though all acknowledged its growing potential. Participants emphasised the need for improved integration of AI-generated insights with CRM systems to fully unlock its capabilities. As a result, the task-technology fit for lead generation is not yet fully realised but shows promise as South African digital marketers continue to optimise their use of the technology.

5.2.2 Conclusion

Generative AI demonstrates a strong task-technology fit for key digital marketing tasks in South Africa, particularly content creation, customer engagement, behaviour and experience. Tools like ChatGPT, Salesforce and Figma streamline workflows, enhance engagement and enable tailored content delivery. However, the lack of cultural and linguistic adaptability limits its

effectiveness, with the vast majority of participants highlighting challenges in creating authentic, localised content for South Africa's diverse audiences.

While AI is effective for routine customer service tasks, human oversight remains essential for managing complex queries and maintaining trust. Furthermore, lead generation shows promise but requires better integration of AI insights with CRM systems. Addressing these limitations, particularly in localisation and integration, will be critical to maximising generative AI's potential in South African digital marketing.

5.3 Utilisation

To address Research Sub-question 2 on Utilisation, this section examines how perceptions of task-technology fit influence the utilisation and effectiveness of generative AI tools. The analysis is framed by Goodhue and Thompson's (1995) Technology-to-Performance Chain (TPC) model, which identifies eight utilisation factors to assess the practical application of technology in real-world content creation. Findings from Chapter 4 indicate that, while generative AI is widely adopted, the extent and effectiveness of its use vary significantly based on specific influencing factors.

5.3.1 Research Sub-question 2:

How does the perceived task-technology fit affect digital marketers' use of generative AI?

5.3.1.1 Capability: Strong Potential, Dependent on Input Quality

The capability of generative AI tools was acknowledged by the vast majority of participants as highly favourable, with respondents noting the technology's ability to perform diverse content creation tasks effectively. Tools like ChatGPT, MidJourney and Adobe Firefly were described as capable of rapid content generation, customer engagement and ideation. However, participants emphasised that the quality of the outputs depended heavily on prompt quality and input accuracy, with well-crafted prompts yielding the most effective results.

Over half of the participants reported favourable quality of AI-generated outputs, they also noted concerns about echo chambers, predictability and general errors. These challenges were perceived as potential threats to utilisation, as they could reduce trust in the tools' reliability. Despite this, most participants believed that high-quality inputs were critical to mitigating these issues, reinforcing the importance of user skill and creativity in optimising the technology's capabilities. This aligns well with Goodhue and Thompson's (1995) research, which found that

the higher the output quality, the better the utilisation level. Furthermore, the strong task-technology fit in this area was attributed to the tools' flexibility and ability to handle a wide range of functions effectively.

5.3.1.2. Timeliness: A Key Driver of Utilisation

Timeliness emerged as a critical factor influencing generative AI utilisation, with an overwhelming majority of participants highlighting massive time savings as the primary reason for using the technology. Participants described the tools as invaluable in meeting the demands of fast-paced digital marketing environments, allowing for real-time customer engagement, rapid content delivery, and efficient campaign execution.

For many participants, the ability of generative AI to generate high-quality outputs within seconds was a game-changer, significantly enhancing productivity. Timeliness was consistently identified as a major contributor to the strong task-technology fit, making generative AI an indispensable tool for time-sensitive tasks. This also aligns well with Goodhue and Thompson's (1995) findings, which found that the value of the tools was directly linked to the promptness of the responses.

5.3.1.3 Practical Learning Over Formal Instruction

Ease of use was another major factor driving utilisation, with three-quarters of the participants reporting favourable experiences. Generative AI tools were praised for intuitive interfaces, requiring minimal formal training. Most participants identified themselves as tech-savvy and preferred a hands-on approach to learning, experimenting with the technology in real-world scenarios rather than relying on structured training. This practical learning approach further enhanced utilisation, as participants felt confident to explore the tools' capabilities independently. The simplicity and accessibility of generative AI tools significantly contributed to their continued use, reinforcing a strong task-technology fit in this area. This once again aligns well with Goodhue and Thompson's (1995) research, which found that a reduced learning curve was more likely to contribute to continued utilisation.

5.3.1.4 Integration Drives Utilisation, but Restrictions Persist

Seamless integration of generative AI into existing marketing systems was viewed favourably by the majority of participants. Many highlighted the ease of using tools embedded within existing software, such as built-in AI features in platforms like Figma, Canva or HubSpot. This compatibility reduced friction in utilisation, allowing participants to incorporate generative AI into

their workflows effortlessly. This aligns well with research from Goodhue and Thompson (1995), which states that reduced friction increases utilisation.

However, for the minority of participants who faced compatibility issues, the challenges were often tied to company restrictions that limited access to certain tools. These restrictions sometimes forced marketers to use less preferred tools, such as Microsoft CoPilot, which participants described as less efficient compared to tools such as ChatGPT. This overlap of compatibility and authorisation issues negatively impacted the task-technology fit for these individuals.

5.3.1.5 Authorisation: Minimal Barriers, but Significant Impact for a Few

Most participants reported no significant authorisation barriers when using generative AI tools. However, the impact was substantial for a small group of participants whose companies imposed access restrictions. These individuals could not use widely preferred tools like ChatGPT and were limited to authorised tools such as Microsoft CoPilot, which was experienced as less effective and flexible. This lack of access hindered utilisation and reduced the perceived task-technology fit for these users, highlighting the importance of organisational support in facilitating the adoption of generative AI. This perfectly aligns with research from Goodhue and Thompson (1995) regarding access restrictions which naturally challenge utilisation.

5.3.1.6 Preference for Self-Service Over Human Interaction

Research has proven that good support enhances utilisation (Goodhue & Thompson, 1995); however, in this case, there is a dual support function, human and AI. Support mechanisms moderately influenced utilisation, with just over half of the participants expressing favourable experiences. The rest of the participants had no feedback, as support was deemed unnecessary. Most preferred self-service support options, such as built-in AI assistance or online resources, over direct interaction with human support representatives. Participants appreciated the accessibility and efficiency of these self-service options, which aligned with their preference for independent learning and problem-solving. This factor played a moderate role in sustaining utilisation, as effective support, whether automated or online, provided users with confidence in troubleshooting and leveraging generative AI tools.

5.3.1.7 Input Quality Shapes Perceptions of Reliability

Reliability was favourably rated by over half of the participants who mentioned it, although they mentioned that reliability was closely tied to quality and capability. Participants emphasised that

human input quality directly impacted the reliability of AI-generated outputs. Regardless of the technology's technical capabilities, the accuracy and effectiveness of the results largely depended on the clarity and precision of the inputs provided by users. This finding reinforces that human expertise and active involvement are critical in ensuring that generative AI meets expectations. Therefore, reliability remains a key contributor to the strong task-technology fit, contingent on user skill and input quality. This aligns well with research findings regarding trust built through consistent quality output, which is closely connected to quality input in this case (Goodhue & Thompson, 1995).

5.3.2 Conclusion

The analysis of utilisation factors reveals that generative AI tools exhibit a strong task-technology fit, driven by their timeliness, capability, ease of use and compatibility. While challenges such as quality issues, organisational restrictions and input accuracy remain, these are largely mitigated by the tools' overall adaptability and effectiveness. Timeliness emerged as the most significant factor, highlighting the transformative impact of generative AI on productivity and efficiency in digital marketing.

These factors demonstrate that generative AI is highly valued and increasingly integrated into workflows by South African digital marketers. However, the findings also underscore the critical role of human input and organisational support in optimising the technology's potential, paving the way for broader utilisation and greater impact.

5.4 Performance Impact

This section evaluates the performance impacts of generative AI tools in digital marketing, focusing on their effectiveness, efficiency and productivity. Building on the established strong task-technology fit and high levels of utilisation reported in previous sections, this analysis highlights how these factors culminate in significant performance outcomes. Guided by Goodhue and Thompson's (1995) Technology-to-Performance Chain (TPC) model, the findings show that generative AI has transformed how South African digital marketers approach their work, delivering measurable gains across multiple dimensions.

5.4.1 Research Sub-Question 3:

How does the perceived impact of generative AI affect the performance of digital marketers in their content creation processes?

5.4.1.1 *Enhanced Relevance, Engagement and Personalisation*

Three-quarters of participants rated generative AI's effectiveness highly favourable, citing its ability to create relevant, engaging and personalised content as a key performance benefit. AI tools like ChatGPT and Adobe Firefly were praised for enhancing content quality and driving stronger audience engagement. However, those who expressed concerns highlighted the critical role of human input in maintaining cultural and contextual relevance. Participants consistently reiterated that capability, quality and reliability are intrinsically linked to the user's ability to craft precise and effective prompts. As many participants remarked, the technology is only as good as its user.

Despite these concerns, participants reported overall effectiveness levels of 80-85%, driven by AI's ability to automate and refine content creation processes. The integration of human oversight ensured that AI-generated outputs aligned with brand standards and audience expectations, particularly in a culturally diverse market like South Africa. This synergy between AI and human expertise reinforced the strong task-technology fit observed in earlier sections, enabling generative AI to deliver high-performance impacts in effectiveness.

5.4.1.2 *Efficiency: A Game-Changer in Performance*

Efficiency was unanimously identified as the most significant performance driver, with all of the participants emphasising its transformative impact. Generative AI drastically reduced the time required for content creation, turning tasks that previously took months to complete to only requiring a few weeks and replacing hours of manual effort with a single click. This substantial time savings enabled marketers to meet tight deadlines and respond swiftly to market demands, making generative AI indispensable in the fast-paced digital marketing landscape. This is in line with research done by Deloitte (2024), which projected that generative AI could lead to a 56% increase in productivity and efficiency.

Participants highlighted that generative AI not only accelerated content generation but also allowed them to reallocate time to higher-value activities, such as brainstorming new ideas, conducting research and advancing other strategic projects. They agreed that this efficiency boost is invaluable in an environment where responsiveness is critical. By streamlining routine tasks and minimising manual effort, generative AI has transformed daily operations, freeing marketers to focus on the more strategic and creative aspects of their work.

The consistent reports of significant time savings across interviews reinforced the substantial performance impact of efficiency, further solidifying the strong task-technology fit. Efficiency

emerged as a standalone benefit and a key enabler of increased productivity, as explored in the following section.

5.4.1.3 Productivity: Elevating Strategic Focus and Output Quality

The efficiency gains delivered by generative AI directly translated into higher productivity levels. Participants reported that AI tools allowed them to manage heavier workloads without requiring additional headcount, with some teams noting a 40% increase in productivity. This gain enabled the redeployment of capacity, allowing marketers to shift their focus from routine, lower-level tasks to more strategic and creative work. This also aligns with findings from Deloitte (2024) that predicted generative AI would reduce costs by 32% and increase innovation and growth by 31%.

All participants (100%) agreed that generative AI had fundamentally changed their approach to digital marketing. By automating repetitive tasks, the technology freed up time for knowledge-based work such as campaign strategy, data analysis and creative ideation. The performance impact of productivity underscores the transformative potential of generative AI, enabling marketers to innovate and execute at a higher level.

5.4.2 Conclusion

The findings demonstrate that generative AI delivers significant performance impacts across effectiveness, efficiency and productivity, driven by its strong task-technology fit and high utilisation levels. With three-quarters of participants emphasising its effectiveness, all praising its efficiency, and all reporting positive productivity gains, the data highlights the transformative role of generative AI in South African digital marketing.

Efficiency emerged as the leading factor, underpinning improvements in productivity and enabling marketers to achieve more with fewer resources. Meanwhile, the human-AI collaboration ensured that effectiveness was maximised, with cultural and contextual relevance maintained through human oversight. Together, these factors paint a comprehensive picture of how generative AI enhances digital marketing performance, providing marketers with the tools to operate more strategically and effectively in an increasingly competitive landscape.

These findings confirm that generative AI is a tool for operational enhancement and a catalyst for strategic growth, making it an indispensable asset in modern digital marketing. The strong task-technology fit and high utilisation levels reported earlier culminate in these performance outcomes, solidifying generative AI's role as a revolutionary technology in the South African digital marketing sector.

CHAPTER 6 – CONCLUSION & RECOMMENDATIONS

6.1 Introduction

The study aimed to describe how South African digital marketers utilised generative AI in their work. This concluding chapter further illustrates key insights that align with the study's research objectives. Based on these findings, practical recommendations are offered, focusing on the potential for African AI solutions to enhance task-technology fit and usage effectiveness. The chapter also outlines directions for future research, concluding with a discussion that ties the study's findings back to the initial research questions and objectives.

6.2 Conclusion

This research confirms that generative AI is a transformative force in content marketing, fundamentally reshaping South African digital marketers' workflows and strategies. Drawing on the dual-framework approach of Goodhue and Thompson's (1995) Technology-to-Performance Chain (TPC) model and Gupta et al.'s (2024) Seven Areas of Impact Framework, this study explored the intricate dynamics of task-technology fit, utilisation, and performance impacts.

Chapter 5 highlighted three critical findings:

6.2.1 Task-Technology Fit:

The study identified a strong alignment between generative AI's capabilities and content creation tasks, particularly in ideation, quality assurance and digital asset production. However, cultural and linguistic challenges persist, limiting authenticity and relevance in the South African context.

6.2.2 High Utilisation Levels:

Utilisation patterns revealed that digital marketers widely utilise generative AI, appreciating its versatility, timeliness and compatibility with existing workflows. Notably, participants cited the importance of input quality and seamless integration to maximise AI effectiveness, overcoming occasional challenges like access restrictions and training gaps.

6.2.3 Notable Performance Impacts:

Generative AI substantially impacted efficiency, effectiveness and productivity, and participants unanimously acknowledged its role in reducing time-intensive tasks. Time savings allowed marketers to shift focus from routine execution to strategic and creative work, underscoring the transformative potential of this technology.

The synthesis of these findings reinforces the hypothesis that favourable task-technology fit and high utilisation levels result in significant performance impacts. However, the research also highlights the importance of human oversight, input quality and localisation for achieving optimal outcomes. As generative AI evolves, addressing these limitations, particularly the lack of Africa-centric datasets will be critical for sustaining its relevance and effectiveness in South Africa.

This study underscores the value of generative AI as a tool for efficiency and innovation by providing a comprehensive analysis. It also invites further research into tailored AI solutions that reflect South Africa's cultural and linguistic diversity, ensuring that the technology becomes an even more powerful enabler for digital marketers across the region.

6.3 Recommendations

Based on the findings of this study, the following recommendations aim to enhance the integration, optimisation and performance impact of generative AI in South Africa's digital marketing context. These recommendations focus on developing bespoke South African solutions, improving organisational access and compatibility, and guiding marketers in adopting generative AI effectively.

6.3.1 *Bespoke African AI Solutions*

To address the challenges of cultural and linguistic authenticity, there is an urgent need to develop localised generative AI marketing technology tailored specifically to South Africa's diverse markets. Bespoke AI solutions can incorporate regional languages, cultural nuances and market-specific trends, significantly improving the task-technology fit and driving higher utilisation rates.

By fostering an ecosystem of South African AI innovation, marketers can leverage tools that resonate authentically with their audiences, addressing authenticity concerns while tapping into an underserved market. Supporting local developers and startups in creating such tools will improve the relevance and quality of AI outputs and position South African AI solutions as competitive players in the global market. These efforts align directly with the study's findings, demonstrating the potential for higher performance impacts through culturally adaptive AI solutions.

6.3.2 *Organisational Access, Compatibility and Secure Generative AI*

Organisational access and compatibility emerged as critical factors in generative AI utilisation. Companies could consider investing in in-house generative AI systems, designed for bespoke

purposes, ensuring compatibility with existing workflows and providing enhanced security measures that safeguard their valuable customer data. These internal systems can be customised to address organisational needs, offer better control over sensitive data and eliminate access restrictions often imposed by external generative AI tools.

Investment in secure, in-house AI infrastructure enhances compatibility and mitigates risks associated with external tool restrictions. Such systems empower organisations to fully leverage the benefits of generative AI while maintaining alignment with corporate policies and data protection standards. Organisations could evaluate these opportunities as strategic investments that can yield substantial long-term benefits in efficiency, productivity and overall performance impact.

6.3.3 Adoption for New Market Entrants

For South African digital marketers who have yet to adopt or successfully utilise generative AI, this study recommends evaluating generative AI needs using the research framework (see Chapter 2). Through Gupta et al.'s (2024) Seven Generative AI Impact Areas, marketers can identify specific tasks and areas where generative AI can provide value, such as content creation, personalisation and customer engagement and focus on solutions with the greatest potential for overall performance impact.

Additionally, marketers could assess their potential investment against the eight utilisation factors (Goodhue & Thompson, 1995) outlined in the study, ensuring that the chosen tools provide a strong task-technology fit and tangible utilisation benefits. This evaluation will help marketers determine whether generative AI is an effective and cost-efficient investment rather than a resource that incurs higher costs than its outputs justify. Starting small with pilot projects and measuring results can help build confidence and familiarity with the technology, leading to broader adoption and optimisation.

6.4 Further Study

Firstly, building upon this study's objectives, future research could explore the evolving dimensions of generative AI to deepen its effectiveness and integration within South African digital marketing. One promising direction is the continued development of task-technology fit as generative AI advances. By investigating how marketers leverage emerging AI capabilities, researchers can contribute to refining the functionality and alignment of technology tailored specifically to South African contexts.

Recent studies have emphasised the transformative potential and challenges of generative AI in content marketing, offering a foundation for further exploration of its applications. Risqo et al. (2023) propose a comprehensive research agenda that examines the role of generative AI in content creation, digital platforms, and customer engagement. Their work highlights critical areas such as task allocation between AI and human labour, the importance of effective, prompt design, and the implications of AI-generated content on trust and perceived authenticity. This agenda underscores the urgent need to address emerging challenges, such as ensuring cultural and contextual relevance, mitigating risks of misinformation and refining human-AI collaboration. Building on these insights, future research can delve deeper into how generative AI can be adapted to unique market contexts like South Africa's, driving innovation while maintaining authenticity and engagement.

An especially intriguing area for future study is the application of "prompt-to-action" processes, which represents the next frontier in generative AI. Participant 4 highlighted this potential, noting:

"The end goal of this technology is efficiency and effectiveness. I haven't really seen it from a process automation execution point of view... Huge potential, but I haven't really seen much of it yet. So, if we talk about providing info, asking, and answering queries, a lot is happening, but downstream, ask after answering the query. From a generative AI point of view, I don't really see companies doing much about that yet."

This insight underscores a gap in how generative AI can extend beyond information generation to actionable process automation. Future research could investigate how generative AI might seamlessly transition from query response to executing downstream actions, unlocking new efficiencies and enhancing task alignment. By addressing this emerging application, researchers can contribute to shaping generative AI's role in driving deeper, actionable impacts within the digital marketing landscape.

Secondly, future research could examine the impact of generative AI on employment in digital marketing, focusing on how the technology redefines roles and skillsets. Participant 1 highlighted this potential:

"I think these tools are really useful in the way that they can assimilate vast data sets and give insights that no human mind would be able to churn... Businesses that embrace the technology and make it clear they're not looking to replace

people but upskill them will help their teams remain relevant... I think there will be an absolute impact on people's jobs."

This emphasises the need to explore upskilling and reskilling strategies that enable marketers to collaborate with generative AI effectively. Research could also investigate how clear organisational communication about AI's role in enhancing, rather than replacing human contributions can encourage adoption and reduce resistance.

Additionally, future studies could assess the long-term effects of generative AI on job roles, team dynamics and employee performance, ensuring that AI adoption drives growth and innovation while empowering the workforce.

In conclusion, the future of generative AI in South Africa's digital marketing landscape presents immense transformative potential alongside unique challenges that call for a distinctly local approach. As Participant 8 aptly reflects:

"I think it's one of those things that's, at the same time, is completely revolutionary and also ridiculously overblown... I'm quite keen to see when the jargon stops, kind of where we end up. I do think it's a very interesting time and if we have that kind of viewpoint five years from now, a lot of what we're currently doing as marketers, as brands, is going to be completely shifted."

The findings of this study highlight the urgent need for generative AI marketing solutions tailored to South Africa's diverse cultural and linguistic landscape. By embracing localised AI innovations, digital marketers and brands can address authenticity challenges and lead the way in creating content and engagement strategies that reflect South African society's rich values and diversity. As marketers navigate the current hype, adopting a grounded and localised approach will ensure that generative AI becomes a powerful tool for transformation, driving meaningful connections and long-term growth in the industry.

APPENDIX A

Draft interview questions based on the conceptual framework.

The following interview questions were developed using the Technology-to-Performance Chain (TPC) model and Gupta et al.'s (2024) seven areas of generative AI impact.

TPC Component	Interview Questions: 7 Impact Areas
Task Characteristics	1. Customer Engagement: How do you use generative AI to enhance customer engagement in your content generation tasks? 2. Customer Service: How does generative AI assist in improving customer service through your content creation processes? 3. Customer Experience: In what ways does generative AI contribute to enhancing the overall customer experience? 4. Content Creation: How do you integrate generative AI into your primary content creation tasks? 5. Personalisation: How does generative AI help personalise content for your target audience? 6. Lead Generation: How do you utilise generative AI for lead generation activities in your digital marketing content strategy? 7. Consumer Behaviour: How does generative AI aid in understanding and influencing consumer behaviour through content?

Technology Characteristics	1. Customer Engagement: What generative AI tools do you use to enhance customer engagement, and how are they deployed? 2. Customer Service: Which generative AI tools are used to improve customer service, and how effectively do they perform? 3. Customer Experience: How do the generative AI tools you use contribute to improving customer experience? 4. Content Creation: What generative AI tools are used for content creation, and how do they streamline the process? 5. Personalisation: How do the generative AI tools support personalisation in your content marketing? 6. Lead Generation: What tools do you use for lead generation, and how do they enhance this process? 7. Consumer Behaviour: How do the generative AI tools help analyse and influence consumer behaviour?
Task-Technology Fit	1. Customer Engagement: How well do you think the generative AI tools match your tasks for enhancing customer engagement? 2. Customer Service: How well do the generative AI tools fit with your tasks for improving customer service? 3. Customer Experience: How suitable are the generative AI tools for tasks aimed at enhancing customer experience?

	4. Content Creation: How well do the generative AI tools align with your content creation tasks? 5. Personalisation: How well do the generative AI tools fit your tasks for content personalisation? 6. Lead Generation: How well do the generative AI tools support your lead generation tasks? 7. Consumer Behaviour: How well do the generative AI tools assist in tasks related to understanding and influencing consumer behaviour?
--	---

TPC Component	Interview Questions: 8 User Evaluation Factors
Utilisation	1. Generative AI Quality: How does the quality of AI-generated content influence your decision to use generative AI tools in your content creation process? 2. Capability: To what extent do the generative AI tools you use, meet your functional requirements for various content generation tasks? 3. Authorisation: How do generative AI tools' security and access control mechanisms impact your usage of these technologies? 4. Compatibility: How well do generative AI tools integrate with your existing systems and workflows for content creation? 5. Timeliness: How does the speed and responsiveness of generative AI tools affect your usage in generating content? 6. Reliability: How consistent and dependable are the generative AI tools you use in your content creation processes?

	7. Ease/Training: How user-friendly are the generative AI tools, and how sufficient is the training provided for effectively using these tools? 8. Relationship: How do the quality of support and interactions with AI tool providers influence your usage of these technologies?
Performance Impacts	1. Efficiency: How have generative AI tools streamlined your content creation process and reduced the time and effort required? 2. Effectiveness: In what ways have generative AI tools increased the effectiveness of your marketing content, particularly in terms of relevance, personalisation and customer engagement? 3. Productivity: How have generative AI tools enabled you to make overall performance improvements in your marketing efforts?

REFERENCES

- Adobe Experience Cloud Team. (2023, May 23). Content marketing. Adobe Blog. <https://business.adobe.com/blog/basics/content-marketing>
- Adobe. (2024). Adobe Firefly: Generative AI for creativity. Adobe. <https://www.adobe.com/sensei/generative-ai/firefly.html>
- Anthropic. (2024). Claude: Next-generation AI assistant. Anthropic. <https://ai-pro.org/start-claude-ai/>
- Atlas.ti Scientific Software Development GmbH. (2024). Atlas.ti [Computer software]. <https://atlasti.com>
- Canva. (2024). Design anything with Canva. Canva. <https://www.canva.com/>
- Clynch, H. (2024, April 4). AI: The African opportunity. African Business. <https://african.business/2024/04/technology-information/ai-the-african-opportunity>
- Content Marketing Institute. (n.d.). What is content marketing? <https://contentmarketinginstitute.com/what-is-content-marketing/>
- Crick, J. M. (2021). Qualitative research in marketing: What can academics do better? *Journal of Strategic Marketing*, 29(5), 390–429. <https://doi.org/10.1080/0965254X.2020.1743738>
- Deloitte Digital. (2023, October 8). Generative AI's transformation of content marketing. Deloitte Digital. <https://www.deloittedigital.com/us/en/insights/perspective/generative-AI-press-release.html>
- Deloitte Digital. (n.d.). Content studios. Deloitte. <https://www.deloittedigital.com/us/en/capabilities/technology-operations/content-studios.html>
- Deloitte. (2023, July 16). Deloitte Africa launches generative AI practice. Deloitte. <https://www.deloitte.com/za/en/about/press-room/deloitte-africa-launches-generative-ai-practice.html>

- Deloitte. (2024). State of generative AI in the enterprise.
<https://www2.deloitte.com/us/en/pages/consulting/articles/state-of-generative-ai-in-enterprise.html>
- Figma. (2024). Figma: Design, prototype, and gather feedback all in one place.
Figma. <https://www.figma.com/>
- Figma. (n.d.). Difference between UI and UX. Figma.
<https://www.figma.com/resource-library/difference-between-ui-and-ux/>
- Gartner. (2024). Artificial intelligence.
<https://www.gartner.com/en/topics/artificial-intelligence>
- Gartner. (2024). Generative AI. <https://www.gartner.com/en/topics/generative-ai>
- Gartner. (2024). Hype cycle for digital marketing [Graphic].
<https://www.gartner.com/en/articles/3-impending-technology-shifts-rule-the-gartner-hype-cycle-for-digital-marketing>
- Goodhue, D. L., & Thompson, R. L. (1995). Task-technology fit and individual performance. *MIS Quarterly*, 19(2), 213–236.
<https://www.proquest.com/docview/218139832>
- Google. (2024). Google Gemini: AI-powered content generation. Google.
<https://gemini.google.com/>
- Gupta, R., Nair, K., Mishra, M., Ibrahim, B., & Bhardwaj, S. (2024). Adoption and impacts of generative artificial intelligence: Theoretical underpinnings and research agenda. *International Journal of Information Management Data Insights*, 4(1), 100232.
<https://doi.org/10.1016/j.jjime.2024.100232>
- Hollebeek, L. D., & Macky, K. (2018). Digital content marketing's role in fostering consumer engagement, trust, and value: Framework, fundamental propositions, and implications. *Journal of Interactive Marketing*, 45, 27–41. <https://doi.org/10.1016/j.intmar.2018.07.003>

- Hsieh, H., & Shannon, S. E. (2005). Three approaches to qualitative content analysis. *Qualitative Health Research*, 15(9), 1277–1288.
<https://doi.org/10.1177/1049732305276687>
- Hsieh, S. H., & Lee, C. T. (2021). Hey Alexa: Examining the effect of perceived socialness in usage intentions of AI assistant-enabled smart speaker. *Journal of Research in Interactive Marketing*, 15(2), 267–294.
<https://doi.org/10.1108/JRIM-11-2019-0179>
- Nasila, M. (2024). *African Artificial Intelligence: Discovering Africa's AI Identity*. Jonathan Ball Publishers.
- Wits University. (2020). *Research Integrity Policy*. University of the Witwatersrand.