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AI AND SCRIPTWRITING: A NEW THREAT?

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ABSTRACT

As Artificial Intelligence (AI) becomes increasingly inevitable in the film industry, a critical controversy arises: Can AI replace human scriptwriters, or does it merely serve as a tool to assist them? This study addresses the debate through an academic investigation of *Sunspring* (2016), the first AI-generated film, to map the discourse and offer practical solutions. Using a desk review methodology focused on 2021–2024 literature and critical assessments of *Sunspring*, our findings highlight an urgent need for scriptwriters to master AI as an assistive tool. This approach positions human writers as creative masterminds who harness technological efficiency while avoiding artistic compromises. The paper suggests a teamwork approach, saying that even though using AI is necessary, it should be done carefully to avoid slowing down creativity and to protect the role of human writers. These insights contribute to the AI-creativity debate and provide pragmatic guidance for industry professionals navigating this transformative era. The study concludes that while AI cannot replace human scriptwriters, it can act as a valuable assistant by enhancing ideation; however, it requires human oversight to maintain coherence, emotional depth, and thematic integrity.

Keywords: *Artificial Intelligence, Scriptwriting, Sunspring, Human scriptwriters, Filmmaking*

1. INTRODUCTION

On May 2, 2023, Hollywood writers initiated a strike, the first Writers Guild of America (WGA) strike in 63 years, after failing to reach a deal with the Alliance of Motion Picture and Television Producers (AMPTP). One of the central causes was the increasing use of artificial intelligence (AI) in the scriptwriting process. This strike marked the first large-scale collective resistance against AI in the creative sector. SAG-AFTRA president Fran Drescher underscored the urgency of the issue, stating, “If we don’t stand up now, we will face the threat of being replaced by machines soon.” The protest signals a growing anxiety within the film industry about the potential of AI to displace human labor, especially in roles traditionally associated with creativity [1].

The rapid advancement of AI technology has significantly enhanced efficiency across various text-based industries. From generating corporate reports to automating press releases, AI has proven capable of producing coherent, structured content at speeds that surpass human output. It can also perform tasks such as text classification, keyword extraction, and content segmentation with increasing accuracy, often reducing the need for manual editing and labor-intensive processes [2]. In this context, AI has become not only a powerful tool but also a disruptive force.

The introduction of tools like ChatGPT has accelerated this disruption. Companies across sectors have reduced their workforce, claiming that AI can now perform roles previously filled by humans. While these actions have drawn public criticism, many companies have experienced significant stock market gains, suggesting that financial markets reward AI adoption over job preservation [2]. A telling example is BuzzFeed’s layoff of 180 writers, replaced by AI-generated content. Despite backlash, its stock rose by 150%, further emphasizing the economic incentive behind automation [2].

However, AI is not without its limitations. In 2023, a seasoned U.S. lawyer, Steven Schwartz, used AI to generate legal precedents for a case. The cases generated by the AI, while they appeared plausible, were completely fictitious. Submitting the unverified AI-generated cases resulted in a failed defense and public controversy [1]. This incident illustrates the risks of overreliance on AI, particularly in fields that require judgment, nuance, and accountability—qualities central to storytelling and screenwriting.

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Table 1: Companies in the Film Industry That Have Integrated AI Technology in Their Productions Over the Past Years [3]

Film related firms	Artificial intelligence services	Years
Digital domain	American visual effects and digital production companies have recreated facial expressions for the character *Thanos* in "*Avenger: Infinity War*" and "*Avengers: Endgame*"	2019 and 2018
Animal logic	Australian animation and visual effects digital studio have used cloud-based render to speed up its animation workflow in the "*Peter Rabbit 2*" trailer	2018
20th-Century Fox	It has used AI to predict the liking of the audience in the "*Logan*" trailer	2017
Infinite Analytics Nucleus ('IAN')	The company's AI platform has used data analytics to pull the audience for the movie "*Shaadi Mein Zaroor Aana*" in India for the first time	2017
ScriptBook	To evaluate gender preference by using deep learning to explore screenplays and success of film and television such as in "*Wonder Woman*" and "*Captain Marvel*"	2017
IBM Watson	"*Morgan*", the world's first movie trailer was edited by using AI	2016
Vault ML	It helps to predict box office data over the scripts of 40,000 movies to manage the risk for filmmakers	2015
Cinelytic	Los Angeles-based startup company licenses historical data about movie performances and cross-reference it to match the key talent using machine learning	2013
Legendary Entertainment	In the movie "*The Dark Knight*" and "*The Hangover*", AI was used to develop user preferences	2005

AI plays an increasingly pivotal role in reshaping the film industry, particularly in decision-making at the early stages of production. AI tools assist in evaluating project viability, estimating box office performance, and influencing key creative and financial choices. The industry is also experiencing advancements in personalized user experiences, task automation, and enhanced video production techniques, leading to more immersive and realistic audiovisual content [4].

Table 2: Implementing AI in the Filmmaking Process Spans Pre-Production, Production, and Post-Production. The Following Figure Illustrates AI's Increasing Role in the Industry [5]

COMPANIES / PROJECT	AI USED	STAGE OF FILMMAKING
Warner Bros. for "Logan"	Cinelytic	Casting and Film's Box office success
Disney for "Avengers: Infinity War"	FaceDirector	Adjust an actor's acting in post-production
"The Irishman" - Film	Deepfake	De-age actors
"Morgan" - Film	IBM Watson, Chatbots	Used to make a movie trailer and market the film.
Sky Walker sound, Part of Lucasfilm	AI algorithms	Classify and recover sounds from their library to speed up the process of sound design.
Warner Bros. for "Aquaman	AI chatbots and algorithms	Used for Marketing purposes
Netflix"	AI algorithms	Suggestion of films according to their past data

Beyond production logistics, AI contributes to areas such as movie recommendations, distribution strategies, and the generation of visual elements, helping filmmakers refine scripts and develop compelling characters. However, concerns arise regarding the potential for algorithmic bias, lack of originality, and uniform decision-making that could limit creative diversity. Despite these challenges, AI is growing into a vital part of filmmaking, influencing scriptwriting, character performances, and advanced visual effects [4].

Table 3: Application of AI in Different Stages of Filmmaking Across Various Films in Recent Years [6]

Sl No.	Movie Names and AI Application		
1	**The Mandalorian (TV Series) (2019)** Virtual Production Techniques: By integrating AI-driven virtual sets and digital landscapes, the production team was able to visualize and interact with CGI elements during filming, enhancing the overall production quality and efficiency.	6	**The Lion King (2019)** **CGI Animation:** The 2019 remake of The Lion King utilized AI-driven CGI animation to bring the characters to life. By employing AI algorithms to simulate realistic animal movements and expressions, the filmmakers were able to create visually stunning and lifelike renditions of beloved characters like Simba, Mufasa, and Scar.
2	**Ex Machina (2014)** **Character Animation and AI Ethics:** Ex Machina utilized AI-driven character animation techniques to bring the humanoid robot character, Ava, to life. The film also delved into ethical questions surrounding AI and robotics, sparking discussions about the implications of creating sentient artificial beings.	7	**Ava (2020)** **Automated Video Editing:** In the action thriller "Ava," AI-driven algorithms were used to automate certain aspects of the editing process. The filmmakers employed AI-powered editing software to analyze footage, identify key moments, and assemble sequences, streamlining the post-production workflow.
3	**Sunspring (2016)** **AI-Generated Script:** Sunsprint is a short film written entirely by an AI algorithm called Benjamin. The film's screenplay was generated by analyzing a dataset of science fiction scripts, resulting in a surreal and unconventional narrative that showcases the creative potential of AI in storytelling.	8	**Avengers: Endgame (2019)** **Visual Effects Generation:**"In the blockbuster superhero film "Avengers: Endgame," AI was utilized for various visual effects sequences, including the creation of the character Thanos. AI algorithms were employed to enhance facial expressions, movements
4	**The Next Rembrandt (2016)** **Script Analysis and Geneeration:**In the marketing campaign for the Dutch financial services company ING, AI was used to analyze Rembrandt's works and create a new painting in his style. The AI-generated painting, titled "The Next Rembrandt," showcased how AI can analyze artistic elements and produce original content.	9	**The Irishman (2019)** **De-aging Technology:**The Irishman" utilized AI-driven de-aging technology to digitally rejuvenate actors Robert De Niro, Al Pacino, and Joe Pesci for flashback scenes spanning several decades. The technology seamlessly integrated with the narrative, allowing the actors to portray characters at different stages of their lives convincingly.
5	**Skyfall" (2012)** **Big Data Analytics:** The James Bond film "Skyfall" utilized AI-driven big data analytics to inform marketing and distribution strategies. By analyzing audience demographics, viewing habits, and social media engagement, the filmmakers tailored promotional campaigns to target specific demographics and maximize audience engagement.	10	**The Mitchells vs. The Machines (2021)** **Audience Engagement:** In the animated film "The Mitchells vs. The Machines," AI-driven algorithms were used to personalize animated characters and environments based on audience preferences. The filmmakers utilized AI to tailor the film's visual style and narrative elements to resonate with specific target demographics.

As an example of AI implementation in the film industry, AI technologies enhance production efficiency by simplifying the creation of Computer-Generated Images (CGI) and special effects while reducing manual costs for production companies. This benefit of AI makes it a more cost-effective alternative to human labor. For example, *The Lord of the Rings* (2001) heavily relied on these technologies. Without them, bringing such an imaginative world to the screen would have been impossible [1].

In 2016, Andy Herd began developing an AI for scriptwriting called Benjamin. Benjamin was given scripts available online to study so that it could eventually generate film scripts on its own [7].

When creating scripts, AI collects existing scripts and then combines them to produce a new script. Therefore, AI does not create something original but combines existing data [2]. Incorrect data could lead AI to generate inaccurate information, so human oversight remains necessary [4].

One of the main limitations of AI-generated scripts is their tendency to use confusing or nonsensical language and to create absurd plotlines. In contrast, humans have complex emotions, refined literary skills, unique creative thinking, and a profound understanding of culture, qualities that AI, as it stands today, cannot fully replicate [7].

AI's ability to quickly gather a vast number of references far outpaces the average human's speed. This capability allows AI to study and analyze scripts

more efficiently [8]. Nevertheless, as AI continues to advance, its growing role in filmmaking raises concerns about the potential replacement of human jobs in the industry [1].

These developments raise a critical question for the film industry: Can AI replace human scriptwriters, or does it merely serve as a tool to assist them? With growing concerns about AI's creative capabilities, the need to clarify its role in storytelling has never been more urgent. The 2023 screenwriters' strike serves not only as a reaction to labor issues but also as a reflection of broader uncertainties about authorship, creativity, and artistic integrity in the age of automation.

2. MATERIALS AND METHODS

According to the paper *Research on the Application of Artificial Intelligence in the Film Industry*, there are three areas of film production where AI can be utilized: scriptwriting, special effects, and video restoration [7]. In this study, the author explores how AI can assist in scriptwriting or whether it poses a potential threat.

This research employs a desk review method, a data collection and analysis technique based on existing literature [9]. The desk review involves identifying, gathering, and analyzing relevant and recent literature sources on the relationship between AI and scriptwriting. In this context, the selected literature includes publications from 2021 to 2024. Additionally, this study incorporates reviews of *Sunspring* from reputable media sources to provide a practical perspective on AI-generated scriptwriting. This desk review approach allows the author to explore various perspectives from existing findings.

The desk review will focus on collecting data from scholarly journals that specifically discuss the role of AI in scriptwriting. The analysis will involve identifying key themes and trends and comparing existing studies. The author will analyze how AI has been applied in scriptwriting, including the advantages and limitations identified in the literature.

This research is qualitative, where the author not only gathers data but also connects and compares the role of AI in scriptwriting based on the selected literature. Additionally, *Sunspring*, an AI-generated short film, is used as a case study to analyze AI's advantages and limitations in scriptwriting. Through this approach, the study aims to provide a more profound understanding of the role of AI in the scriptwriting process and its implications for the film industry.

This research clarifies the extent to which AI can assist or threaten human scriptwriters in the future. It also explores the advantages and limitations of AI in scriptwriting and examines the case study of *Sunspring* to provide a concrete example of AI-generated storytelling. Through this approach, the study aims to offer a comprehensive understanding of AI's potential impact on the scriptwriting industry.

3. FINDINGS

3.1. Survey Results on AI in the Filmmaking Industry

Based on the survey results presented in the paper *Artificial Intelligence as a Facilitator for the Film Production Process* conducted by Hardeep Singh, Dr. Kamaljeet Kaur, and Preet Pinder Singh among individuals in the creative field, out of 105 respondents, 98% were aware of AI and its role in the film production process. Of these, 70% agreed, 22% disagreed, and 8% believed that AI could serve as a facilitator in the filmmaking process to some extent. Additionally, 84% believed that AI represents the future of film production, while 10% of respondents felt that AI would play a role in the film industry, but only to a certain extent. Furthermore, 94% expressed a desire to see AI and VFX utilized in future films, and 88% agreed that AI could enhance the likelihood of a film's success [8].

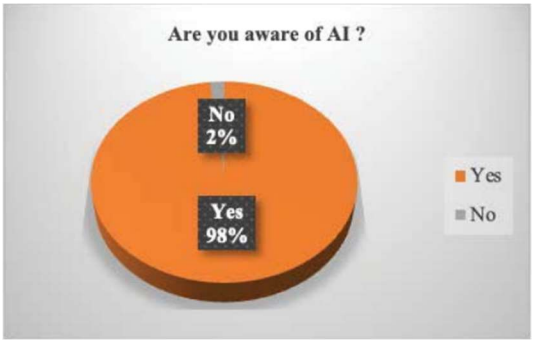

Figure 1: Of 105 Respondents Among Individuals in the Creative Fields, 98% Were Aware of AI [8]

Figure 2: Of 105 Respondents Among Individuals in the Creative Fields, 98% Were Also Aware of the Film Production Process [8]

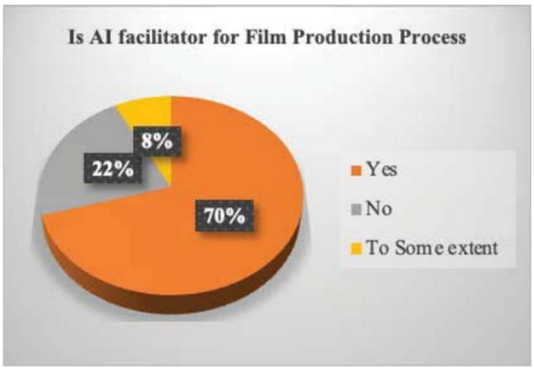

Figure 3: 70% of Respondents Agreed That AI Facilitates the Film Production Process [8]

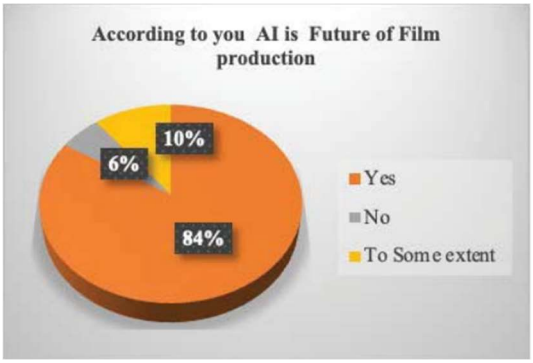

Figure 4: 84% of Respondents Agreed That AI Is the Future of Film Production, Indicating That AI Will Undeniably Be Used in Future Filmmaking [8]

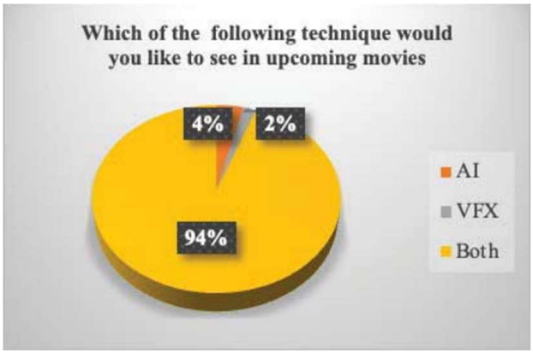

Figure 5: 94% of Respondents Anticipate the Integration of Both AI and VFX as Essential Techniques in Future Filmmaking [8]

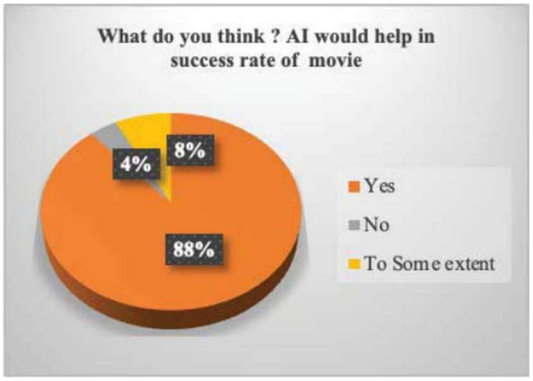

Figure 6: 88% of Respondents Agreed That AI Has the Potential to Increase a Movie's Overall Success Rate at the Box Office [8]

3.2. The Development of AI in Scriptwriting

Artificial intelligence can be categorized into three stages based on its capabilities and development. The first stage is weak AI, which specializes in specific tasks but lacks general intelligence. AI at this stage excels in one domain, such as playing chess or assisting with data analysis, but cannot perform tasks beyond its designated function. Currently, most AI applications in society belong to this category, as they surpass human abilities in limited fields but do not possess broader cognitive skills [2].

The second stage is strong AI, which refers to artificial intelligence that can match human intelligence across all domains. This type of AI can perform any intellectual task that humans can, including reasoning, problem-solving, and creative thinking. However, developing strong AI is significantly more challenging than weak AI, and it remains beyond our technological reach [2].

The third and most advanced stage is super AI, which surpasses the intelligence of the most brilliant human minds in nearly every field. Super AI would be proficient in technological innovation and problem-solving and possess advanced general and social intelligence. Super AI holds the most potential for literary creation among these three stages, as it could theoretically generate original works that rival or exceed human creativity [2].

As AI continues to develop, its role in scriptwriting becomes increasingly significant. Scriptwriting is one of the most crucial and challenging aspects of film pre-production, requiring technical skill and a profound understanding of human emotions, narrative structures, and thematic complexity. Crafting a compelling script demands mastery of storytelling, the ability to weave intricate themes into a coherent plot, and extensive experience

in writing. Achieving these elements is a complex and time-consuming task for screenwriters. However, AI has the potential to assist in various aspects of the scriptwriting process, offering solutions to some of these challenges [7].

AI can use information stored on the Internet to peruse it and choose the correct stories and references. It can also compare these to other works in its database to prevent duplication. Reports indicate that an AI can write a script significantly faster than a human scriptwriter [7].

By 2016, the use of AI in scriptwriting had started. Software developer Andy Herd created an automated scriptwriting program using Google's open-source machine learning service, TensorFlow, by inputting the entire script of *Friends* and allowing the AI to generate new episodes on its own. Around the same time, director Oscar Sharp and artist Ross Goodwin developed an AI named Benjamin to test AI's capability in writing scripts. During the London 48-Hour Sci-Fi Challenge in June, Benjamin's script, *Sunspring*, earned a spot in the top ten finalists [7].

3.3. Sunspring

Figure 7: Sunspring, Directed by Oscar Sharp in 2016, Features a Script Written by an AI Named Benjamin

To develop Benjamin, Sharp and Goodwin trained it using a Recurrent Neural Network (RNN) combined with Long Short-Term Memory (LSTM), feeding it science fiction scripts such as *Star Trek*, *Truman's World*, and *X-Men*. Through this process, Benjamin learned the fundamental structure of scripts, acquired the ability to create stage directions, and generated coherent dialogue. Its productivity is remarkably faster than that of humans, as crafting a refined script usually takes years, whereas AI accomplishes it within days [7].

Sunspring is a short film set in a dystopian future, centered around a love triangle involving characters H, C, and M. AI generated the entire script, resulting in dialogue and narration that frequently seem surreal and challenging to understand. The conversations frequently drift into abstract and perplexing directions, creating a unique yet challenging experience for both the actors and the audience. Led by Thomas Middleditch, the cast attempts to deliver lines that, due to their unconventional structure, can be difficult to convey naturally. Despite its unusual narrative, *Sunspring* serves as a fascinating experiment in AI-driven scriptwriting, demonstrating the potential of machine-generated storytelling in filmmaking [4].

However, despite its innovative approach, *Sunspring* exhibits a significant lack of logical coherence and narrative flow in many of its lines. For example, towards the film's end, a noticeable sense of disorder emerges when the female protagonist faces the camera. Despite this, the overall storyline remains poorly structured, primarily due to the technological limitations at the time [1].

Jonathan Cohn describes the script of Sunspring as largely incoherent, uncanny, surreal, and unexpected. However, he argues that, like many experimental films, its appeal lies not despite but rather because of its incoherence and absurdity. In other words, the flaws in Sunspring's script are what make it intriguing [10].

This inherent incoherence in *Sunspring* encourages us to reconsider how we interpret the output of digital technologies, particularly AI-generated texts. Rather than seeking familiar patterns, we should acknowledge and engage with the extreme unpredictability that AI can produce. This perspective challenges the necessity of adhering to a single reading method, as rigidly applying one approach may create more complications than solutions. Instead of imposing a structured framework, it is essential to reject methodological oppositions to understand better and appreciate AI's distinctiveness in storytelling. While some may attempt to find recognizable elements in *Sunspring*, this film invites us to embrace AI's inherent goodness as something valuable, even if it does not reflect human logic or experience. Recognizing this uniqueness prompts us to view AI not merely as a tool driven by economic efficiency but as a creative collaborator that can push the boundaries of conventional narratives [10].

4. DISCUSSION

The results of the survey conducted by Singh et al. reveal a strong optimism among individuals in the creative industry regarding the role of Artificial Intelligence in filmmaking. An overwhelming 98% of respondents were aware of AI, and 84% believed it represented the future of film production. Furthermore, 94% expressed interest in seeing AI and VFX integrated into future films, while 88% believed AI could increase a movie's likelihood of box office success [8]. These figures suggest that within the

creative community, AI is largely seen not as a threat but as a powerful enabler of innovation and efficiency in the filmmaking process.

However, while the survey reflects positive sentiment, it does not account for the qualitative dimensions of AI's application in scriptwriting. High public expectations may overlook important challenges related to narrative quality, originality, and artistic control. This discrepancy between technological enthusiasm and creative execution calls for a more balanced and critical evaluation of AI's role in scriptwriting. The following sections will analyze both the advantages and limitations of AI in this context, ultimately proposing a collaborative model between humans and AI that preserves creativity while embracing technological advancements.

4.1. Advantages of AI in Scriptwriting

AI has the potential to enhance the efficiency of pre-production by streamlining various time-consuming tasks. From scriptwriting to scheduling, AI can automate screenplay breakdowns, shot list creation, budgeting, and timeline adjustments, allowing filmmakers to focus on the creative aspects of production. Additionally, AI can optimize actor scheduling, identify suitable filming locations, and assist in other logistical processes. By automating these elements, AI reduces the time and effort required in pre-production, ultimately saving costs and increasing overall productivity [8].

The advantages of AI in writing and analyzing film scripts enable filmmakers to save time and costs. AI can study and compare large volumes of film scripts, creating unique scripts and analyzing their stories. AI can identify questions, uncertainties, and solutions, making script analysis faster and easier [8].

AI has become an essential tool in script selection, helping filmmakers identify scripts with high-profit potential by analyzing and comparing existing screenplays. Machine learning algorithms process vast amounts of screenplay data to generate unique scripts, enabling more informed decision-making. Major studios have already implemented AI in this process. For example, Warner Bros. uses Cinelytic AI to predict box office performance. At the same time, 20th Century Fox employs the Merlin system, which leverages AI and machine learning to categorize films, match them with target audiences, and provide detailed demographic insights. By streamlining script evaluation, AI saves filmmakers time and money, making the process more efficient and data-driven [8].

Writing a script is a complex and time-consuming process, making it one of the most crucial aspects of filmmaking. Script development typically takes three to four months, not including additional revisions with directors and producers. Moreover, professional scriptwriters are paid an average of $110,000, adding significant costs to film production. Given the high expenses and lengthy timeframe required for manual scriptwriting, AI-generated scripts present a compelling alternative. By utilizing AI, production companies can significantly reduce costs, as they no longer need to hire human writers or deal with contractual and copyright complexities. Additionally, AI can generate scripts much faster, streamlining the filmmaking process and making production more efficient [1].

AI has the potential to inspire fresh and unconventional narratives, pushing the boundaries of traditional storytelling. The case of *Sunspring* exemplifies this, as the AI-generated script introduces unexpected plot structures, surreal dialogue, and a non-traditional storytelling approach. By breaking conventional writing patterns, AI opens up new creative possibilities, allowing for narratives that might not emerge from human writers alone. However, while AI can generate innovative ideas, its limitations remain evident, particularly in maintaining coherence, emotional depth, and intentionality. *Sunspring* highlights both the promise and the challenges of AI in scriptwriting, demonstrating how it can contribute to creative processes while also exposing its current constraints [4].

Despite its wandering structure and occasional absurdity, Benjamin's script outperforms many low-budget entries in the genre that humans supposedly write. The screenplay explores themes of relationship breakdown and conflicting desires set against an uncertain future. For an AI making its first attempt at screenwriting, tackling the topic of sexuality is particularly bold, yet the result is unexpectedly engaging. Though unconventional, this short film remains surprisingly watchable and will likely become even more intriguing as time passes [11].

AI can assist scriptwriters in identifying suitable narrative structures and character development. Using AI technology in the scriptwriting process can enhance creativity, simplify the writing process, and explore new dimensions of storytelling [4].

4.2. Limitations of AI in Scriptwriting

AI can create scripts at a speed that surpasses human imagination. However, the possible scripts created by AI have certain flaws, such as the

increased level of explicit context and plots that can be illogical and absurd. On the other hand, human scripts contain emotions, mature writing skills, rotational creative thinking, and deep-rooted cultural norms, all of which AI has not been able to attain [7].

Data is the input for AI to generate the targeted results. If the dataset given is biased, then there is a chance that AI will also provide erroneous outputs. This discovery points to the vital need for ethical supervision of artificial intelligence and the proper application of AI technology. AI cannot work independently; it needs to be fed with data and other information to generate the output it is programmed to produce [4].

AI can only generate scripts based on patterns learned from pre-existing materials, limiting its ability to introduce fresh and original ideas. Since AI relies entirely on past scripts for reference, the outcomes tend to be repetitive, making them predictable for audiences. Without human creativity to expand the storytelling boundaries, AI-generated scripts run the risk of becoming predictable and lacking in innovation. As a result, while AI can be a valuable tool in scriptwriting, it cannot replace the originality and creative vision human writers bring to the process [1].

Apart from comparing their works with the other scriptwriters, the scriptwriter also compares his/her script to the other scripts he/she has written. That is the process of self-comparison in AI, which it cannot perform. AI acquires, analyzes, and produces new scripts using the obtained data. In this case, it is easy to see why scripts generated by artificial intelligence seem so familiar and like something one has seen before. Indeed, AI can only imitate the scriptwriters' writing style, so it does not possess its style [2].

Genuine literary creation stems from a writer's deep passion for literature. Only through this passion does a writer develop a lasting commitment to storytelling, embracing its joys and struggles. Great writers are creators and dedicated readers, immersing themselves in literature, drawing inspiration, and refining their craft. Unlike humans, AI lacks the personal journey of perseverance, sacrifice, and lived experience that shapes a writer's voice. It cannot observe profoundly, confront societal realities, or ignite creativity through personal struggles. While AI can generate text, it does not undergo the profound process of growth and discovery that defines true literary artistry [2].

A well-written screenplay must be grounded in rational thinking, as it should reflect the fundamental cognitive abilities of intelligence, such as reasoning and logical thought. However, this aspect fundamentally differs between AI and humans. While AI can process words and construct narratives, only humans can genuinely comprehend meaning, express deeper themes, and craft unique, meaningful stories [2].

Figure 8: Suddenly, in the Middle of a Scene, H Unexpectedly Spits Out a Plastic Eyeball, Yet No One Around Them Reacts, Making the Moment Feel Utterly Absurd [10]

Based on the case study of *Sunspring*, most viewers initially react with confusion, struggling to grasp its meaning. The film blends various chaotic elements, resulting in a sense of disorder and incoherence that makes it challenging to follow. A significant factor contributing to this disjointed experience is the film's AI-generated script, which often lacks logical structure and coherence [2]. Consequently, the author acknowledges that many viewers find it difficult to engage with this short film.

The dialogue and narrative in *Sunspring* frequently drift into surreal and unpredictable directions, further reinforcing its abstract nature. As a result, the actors, including Thomas Middleditch, struggle to deliver their lines naturally, as the unconventional script structure makes it difficult to interpret and perform with clarity [4].

Oscar: Thank you for giving me an opportunity to interview Benjamin. Here is part of the conversation:

Reporter: Are you an author?

Benjamin: Yes you know what I'm talking about. You're a brave man.

Reporter: Whether you might want to join the Writers Guild of America, a union for writers.?

Benjamin: Yes, I would like to see you at the club tomorrow.

Figure 9: Benjamin Didn't Answer the Reporter's Question Sensibly [2]

As shown in the figure above, its responses to the interviewer's questions are often incoherent and lack meaningful context. The answers appear nonsensical, possibly due to the limitations of the AI model used at the time [2]. Such behavior is understandable, considering that this AI was developed several years

before the rise of ChatGPT and other more sophisticated language models.

AI-generated scripts still require human input to be truly effective. While AI can produce scripts in a significantly shorter time, it cannot ensure logical consistency and coherence. Human intervention is essential to refine the script's structure, enhance its logical flow, and make it more engaging for audiences. Without human oversight, AI-generated scripts may struggle with inconsistencies affecting their quality. Therefore, the most effective approach to scriptwriting is a collaboration between AI and human efforts, where AI accelerates the drafting process while humans refine and improve the final output [1].

Writing based on big data is not impossible. AI still lacks emotional investment and a profound understanding of life, making it struggle to grasp and flexibly utilize these materials fully. As a result, AI finds it challenging to create works that go beyond conventional wisdom regarding aesthetics and value [2].

4.3. AI Is Not a Threat: Toward a Human-AI Creative Partnership

A film producer stated, "We should learn to co-exist with artificial intelligence rather than oppose it. AI can help us complete the initial drafts more quickly, allowing screenwriters to focus more on the intricacies and emotional depth of the story" [1]. The author concurs with this perspective, emphasizing that the outright rejection of AI may overlook the practical benefits it offers. While the *Sunspring* script demonstrates how AI-generated content can result in viewers' confusion [2], it points out the potential of AI to support early-stage ideation. By integrating AI tools into the writing process, scriptwriters can streamline initial development while maintaining human control over narrative structure, emotional resonance, and thematic integrity. This collaborative process enables scriptwriters to focus on higher-order creative tasks, such as emotional depth and thematic exploration, while relying on AI to assist with more routine elements of script development.

However, it is important to emphasize that AI cannot operate independently without human oversight. As demonstrated by the outcome of the *Sunspring* script, AI-generated content still requires guidance to align with the intentions and standards expected by scriptwriters. Human involvement remains essential to ensure narrative coherence, thematic relevance, and emotional depth. Therefore, instead of resisting the presence of AI, scriptwriters are encouraged to develop a critical understanding of these technologies and leverage their capabilities to enhance, rather than replace, the creative process. This approach challenges the perception that AI is a threat to human creativity; rather, it positions AI as a tool that complements and enhances human creative abilities without undermining the scriptwriter's artistic role.

For instance, a scriptwriter facing time constraints and struggling with creative blocks could turn to AI for assistance in generating story ideas. By inputting specific prompts or themes, the scriptwriter can utilize AI to provide potential narrative directions. However, rather than relying on the AI-generated content as final, the scriptwriter would engage in an iterative process, refining and adapting the suggestions to align with their vision. This approach emphasizes the symbiotic relationship between human creativity and AI, where AI serves as a tool to support the writer's creativity rather than replacing the writer's role in the creative process. In this evolving partnership, AI accelerates certain stages of development, but the final artistic direction and emotional depth remain in the hands of the writer.

5. CONCLUSION

This paper explores the impact of artificial intelligence on scriptwriting, examining both its advantages and its limitations. Through the case study of *Sunspring*, we see how AI challenges traditional storytelling by generating often incoherent and unpredictable narratives. The *Sunspring* script forces us to reconsider the role of AI in the creative process and question the extent to which it can function as a tool for innovation. While AI's ability to produce scripts at an extraordinary speed exceeds human capability, its limitations remain evident, especially in producing coherent and emotionally nuanced narratives. However, this limitation also highlights AI's potential strength, as it is capable of generating scripts that break conventional logic, making it a powerful tool for unconventional and surreal storytelling. Rather than replacing human scriptwriters, AI serves as an innovative asset that can inspire new creative directions, introduce unconventional narrative structures, and challenge traditional storytelling boundaries.

Nevertheless, AI poses a potential challenge for scriptwriters who resist integrating it into their workflow. Rather than rejecting AI, scriptwriters can harness AI capabilities to assist in specific aspects of the writing process, thereby freeing up more time to focus on the creative aspects of storytelling. Those who incorporate AI into their creative process may

gain a competitive advantage, improving both efficiency and cost-effectiveness. However, AI lacks the lived human experience that imbues stories with authenticity and emotional depth. This fundamental difference ensures that, while AI can be a valuable tool in scriptwriting, it cannot fully replicate the human touch that makes narratives meaningful and emotionally compelling.

6. LIMITATIONS AND FUTURE WORK

This paper presents several limitations. First, the AI model analyzed Benjamin, which was developed in 2016 and is significantly less advanced compared to more recent models such as ChatGPT, DeepSeek, and other large language models. These newer systems possess greater contextual awareness, coherence, and adaptability, which may lead to different outcomes in scriptwriting. Furthermore, due to the rapid advancement of AI technology, findings related to Benjamin may quickly become outdated and may not accurately reflect the capabilities of current or future AI systems.

Second, this study focuses primarily on *Sunspring* and does not include a comparative analysis with a broader range of AI-generated or human-written scripts. A more diverse selection of case studies could provide deeper and more balanced insights into the creative limitations and potential of AI in scriptwriting.

Future research should also explore the extent to which AI is capable of generating absurd or unpredictable narratives compared to human-written scripts. Investigating whether AI or human writers are more prone to producing nonsensical storytelling could offer more profound insight into AI's creative potential and constraints in the domain of narrative construction.

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