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Master Thesis:

*How is the use of AI in auditing perceived by auditors
in social media ?*

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Abstract:

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Key words: AI, Epistemic trust, Social media, Audit, AI Audit

Purpose: The purpose of this thesis is to critically evaluate posts/comments collected from social media on AI auditing to analyze how auditors perceive the application of AI in the auditing industry currently.

Methodology: We did qualitative research using content analysis to conduct our research. We scraped posts/comments from Reddit, Quora, and Weibo for information collection purposes. We used a paraphrasing approach for privacy concerns and we also used MAXQDA, which is a qualitative and mixed methods academic research software, to analyze the data collected.

Theoretical perspectives: We analyzed the posts/comments from a perspective of epistemic trust theory to understand how trust contributes to information sharing in various social settings.

Empirical foundation: To establish the empirical foundation, the data was collected by scraping posts from social media from 2018 to 2024 regarding how auditors perceive AI auditing. For a cross-cultural perspective, data that includes posts/comments was collected from social platforms in different countries such as the US and China, and 163 valid posts/comments were recognized after filtering certain keywords such as 'AI', 'Audit', and 'Artificial intelligence'. For relevance and significance, we manually review the posts/comments to refine our dataset. The research is based on qualitative content analysis and it is conducted with MAXQDA, which is a qualitative and mixed method research software.

Conclusions: Applying the concept of epistemic trust (McCraw, 2015) and doing content analysis with posts/comments from social media provide us with a unique perspective on how AI auditing is viewed by auditors. It was discovered that auditors have similar and some different opinions as they are affected by various cultural factors. The main difference between auditors with different cultural backgrounds is that auditors using Reddit and Quora state that while AI can enhance auditing efficiency and accuracy in repetitive tasks, it cannot replace auditors completely for its lack of professional judgment while others using Weibo consider the replacement challenging as it cannot be held accountable for misjudgments.

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1. Introduction

The use of AI also raises concerns about the handling of sensitive information and potential privacy breaches. To ensure that AI operates within ethical boundaries and does not lead to bias and unfairness remains a broader issue. According to BBC News, a project that aims to guarantee the safety of self-driving vehicles has been launched recently, which includes collaboration between experts, policymakers, and consumers to develop dynamic approaches to prioritize safety and trust in autonomous cars (Christian, 2004). Autonomous vehicles are now widely discussed due to the development of AI technology; however, although their advancements are recognized, AI's inherent limitations are still yet to be addressed, such as inappropriate behavior caused by complexities in sensors (Litton et al., 2024). Besides all the potential issues that AI has brought to the autonomous vehicle industry, further drawbacks such as job replacement, decreasing employment opportunities, and ethical issues of data privacy in artificial intelligence start to attract certain attention, which highlights the need for justified implementation strategies and ethical scrutiny of AI tools (Srbinoska & Donovska, 2023). Studying challenges such as ethical concerns, increasing unemployment not only helps with understanding the complexity in AI management in various areas but also identifying potential risks and developing approaches for strengthening regulatory compliance, enhancing cybersecurity, and achieving optimized integration of AI technologies (Max et al., 2020).

With the evolution of AI, the accounting industry is witnessing transformational changes, inviting opportunities and issues to this area (Kommunuri, 2022). For instance, the benefits include automated processes, improved fraud detection, and enhanced financial prediction, while challenges may refer to ethical concerns and calls for compatible regulations. (Nicolau,2023). With the application of advanced technology in the field where assessments are crucial, the accuracy of estimates can be greatly improved by analyzing historical data, thus minimizing errors and enhancing the credibility of audit reports (Ding et al., 2020). However, the emerging high-end technology also gives rise to assurance challenges that are discovered in various costly incidents and therefore creates the demand for developing more well-functioning systems to enhance governance (Falco et al., 2021). Facing these challenges and the strong need for harnessing digital technology to make improvements in audit quality, auditors are expected to be well-prepared by possessing digital skills and capabilities in a

compelling environment (Sonnerfeldt & Jonnergård, 2023). To study the complexities and exploit the potential of AI in auditing, it is necessary for auditors to develop digital proficiency and build stakeholder trust, ensuring the effective integration of advanced technologies into audit practices. Meanwhile, the incorporation of AI technology into the realm of auditing has already gained significant attention in academic and professional areas because of its transformational impacts on conventional audit procedures (Al-Sayyed et al., 2021). Although AI-based auditing is considered to offer promises in more efficient and accurate audit services, the successful adoption of AI in the auditing domain mainly depends on the trust stakeholders invest in (Manita et al., 2020; Munoko et al., 2020).

Due to the impact that is brought by the development of AI, the auditing process has changed a lot, and it is therefore crucial to understand how audit professionals view this emerging trend. Unlike regular research methods such as interview analysis, scraping posts from the internet offers more dynamic insights into the application of AI auditing, addressing limitations that are faced by traditional research designs. According to Yaman (2023), people use social media platforms for a variety of purposes as in sharing information, communications, and self-expression to maintain social interactions and fulfill their social needs. He pointed out some motivations behind this social behavior. For instance, people might post their opinions on certain topics to attract attention or hope to find people who share the same thoughts in a context of risks or threat. This can be realized without direct interaction with others by receiving comments, likes, or retweets, which show other peoples' approval or disagreement. People also share different types of content on social media such as videos or personal updates in terms of their life experience or professional knowledge, proving that social media has been successfully incorporated into the current society in multifaceted ways. Inspired by one of the findings presented by Yaman (2023) that how online sharing can have impacts on people's social and psychological needs, we decided to study how audit practitioners perceive AI auditing from a social media perspective.

Other than the social needs perception, studying AI auditing from a social media perspective also offers deep insights into how auditors with different cultural backgrounds view this emerging trend (Nolder, 2014). As the internet is accessible to most people around the world, it would be much easier to collect worldwide opinions and get a more comprehensive result from using social media for academic purposes (Kutu, 2022). Kutu (2022) highlighted that through various social media platforms, researchers can keep in touch with people within

different age groups or with diverse backgrounds more easily and efficiently than interview analysis, as it cannot be guaranteed that all the potential candidates are willing to take the interviews while information from social media can be mostly acquired without limitation. From a cultural perspective, auditors in different nations also might conduct professional judgment differently due to various regulatory governance, and these variances can be attributed to institutional and cultural factors (Saiewitz, 2020). For instance, based on Saiewitz (2020), American auditors prefer analytical auditing to highlight the disconfirming information, while Chinese auditors might intend to achieve balances between accurate and disconfirming information from a comprehensive perspective, indicating that American auditors implement a higher level of skepticism than Chinese auditors in some scenarios. Therefore, using social media to study how auditors from different cultural backgrounds view the implementation of AI in the auditing industry provides a unique insight into this field.

Extant literature has discussed how various factors contribute to the development in the auditing industry such as auditors' work content, and corporate strategies (Jacky & Sulaiman, 2022; Budiarmo et al., 2021; Kend, M., & Nguyen, 2022; Wen et al., 2022). Sonnerfeld and Jonnergård (2023) delved into the area of auditor identity, discussing how auditors perceive themselves in a digital world and proposing that technology should be endogenous, while Bauer et al. (2019) centered on auditors and IT professionals' perceptions on the collaborative relationships and highlighted the importance of effectively collaborative audit teams. Furthermore, implications of trusting AI, various aspects of trust in AI systems, and what Alvarado (2023) asks about what kind of AI deserves has also been discussed. However, theory and evidence regarding how AI auditing is perceived by auditing professionals are quite limited. Given the summary gap and a social media perspective offered by prior research, we expect to contribute to this area by researching how professionals on various media platforms identify the functions of AI and auditing in the current business world. This leads to the following research question:

How is the use of AI in auditing perceived by auditors in social media ?

As AI is becoming prevalent in the auditing area, it is necessary to assess their transformational impacts on practical auditing and how stakeholders perceive this advanced tool. Therefore, the aim of this research is to deepen our understanding of how auditors

perceive AI. We systematically analyzed how various social platform users portray the roles of AI in their work and we then provided deep insights into the auditors' understanding and acceptance of AI based on our analysis.

2. Literature Review

As AI is widely used in various industries, there is a growing need for AI to be governed for privacy and ethics concerns (Minkkinen et al., 2024). According to Raji et al. (2020), AI auditing works closely with algorithms and one of its purposes is to ensure transparent and accurate results of AI systems through assessment. Minkkinen et al. (2024) pointed out that despite AI auditing assists in addressing unintended issues, challenges such as a lack of regulatory compliance still exist and they are still yet to be overcome. He also mentioned that although the European Union's Artificial Intelligence Act (AIA) which is designed to make transparent and articulate rules, the finalized version still remains unreleased. According to Minkkinen et al. (2024), measurable metrics regarding ethical concerns are also strongly required to make sure companies are in compliance with ethical principles to minimize ethical risks. In his article, he highlighted that investors are also important participants in responsible AI use which can be achieved by imposing stakeholder pressure and implementing AI governance through Environmental, Social, and Governance (ESG) standards. Manheim et al. (2024) argued that although certain regulations are developed to meet the current need for ethical and appropriate use of AI auditing to address issues such as operational risks, significant challenges still exist. In his article, he stated that the current challenges include inconsistent standards, especially those that might quickly become outdated due to the fast development of AI. In order to develop a healthy environment where AI auditing can be used ethically, Manheim et al. (2024) proposed the idea of AI Audit Standards Board which intends to establish standards to regulate the integration of AI and contribute to reliable and trustworthy auditing procedures. With the AI Audit Standards Board, audit practices can be updated constantly to keep up with the current changes in AI development, thus maximizing auditors' interest and reinforcing the trust in AI auditing. Moreover, Manheim et al. (2024) also stressed the importance of auditing the entire AI development process instead of only the final products. By doing this, issues such as safety washing and ethical concerns can be addressed more effectively (Manheim et al., 2024).

Other than this approach, Manheim et al. (2024) discussed that it can also be useful to learn from other industries such as aviation and nuclear energy where careful audits are strongly required.

Rawashdeh (2023) explored the factors regarding AI-based auditing services within audit firms. Firstly, he discovered that, due to the lack of correlation between quality and value in AI-assisted auditing services, audit firms are suggested to factor in other elements to increase their perceived value by clients. Secondly, the fact that he found positive correlations among perceived quality, client satisfaction, and attitudes towards AI-based services indicated that auditors can boost the trust of clients in AI by enhancing the perceived value of the service that they provide. However, his research also showed some limitations. From a practical perspective, clients' perceptions of AI technologies vary based on the education they receive; however, it would be costly to educate clients about the advantages of AI and that it requires massive resources to mitigate the possible concerns about AI technologies (Rawashdeh, 2023). Audit firms then encounter challenges in how to communicate effectively with their clients and convince them to believe in advanced technology (Rawashdeh, 2023). Clients' concerns mostly include poor reliability and accuracy of AI tools; however, achieving high degrees of reliability and accuracy can be quite challenging due to the dynamic nature of the modern business environment and constantly changing data resources (Rawashdeh, 2023). From an academic point of view, the scope of respondents can be expanded to groups other than professional auditors. Since the influence of the application of AI tools can also extend to various stakeholders, such as individuals, citizens, technology firms, and governments, it is necessary to conduct research on how other parties perceive this emerging technology through various channels, such as social media (David et al., 2024).

According to Koreff et al. (2023), it was the perception of auditees that paraprofessional auditors lack appropriate professional expertise and credentials to conduct data analytic-driven audits, apply judgment with partiality to AI technology, and overlook the impact on the public interest of AI-driven decisions. The result of the interview raises concerns for all audits, especially for those unrestrained use of AI-enabled tools. Of additional interest are the damage of AI technologies on the foundation and evolution of auditing. Koreff et al. (2023) observed that technology dominance effects on the professionalization of audit. For instance, from the research, AI-enabled tools do not necessarily reduce the time spent by auditors on lower-level, labor-intensive tasks to spare

more time on judgment-intensive ones, because novice auditors employing the data analytic do not understand the process.

Nicolau (2023) demonstrated a strong negative correlation between the level of AI implementation and the number of hours required by auditing through a linear regression analysis. The author also addressed some drawbacks and concerns about the integration of AI in auditing. While AI can process complex datasets and generate detailed outcomes, understanding them correctly is challenging for auditors, especially those who are novice. Also, some firms may get over dependent on AI tools, which potentially suppresses the professional judgment and critical thinking of the professionals. Landers and Behrend (2023) proposed a framework for evaluating fairness and bias of AI systems. The variation in definitions of bias and fairness among different stakeholders was crucial to address specific concerns. Such complexity comes from diverse stakeholder perspectives, the difference between technical definitions and social implications, and different legal and ethical standards among different regions and sectors.

Casper et al. (2024) stressed the concept of black-box access referring to a scenario where auditors can only interact with AI by observing AI's inputs and outputs except for its internal working procedures. He pointed out that this type of access offers advantages of simplicity for practitioners only needing to supervise AI from an external perspective. However, he also argued that this approach often fails to detect its drawbacks because certain biases cannot be identified without observation of the working process. Besides, he also highlighted this approach depends on the selective samples which might provide comprehensive information. According to Casper et al. (2024), auditors' ability to discover the root causes of issues is limited because they can only monitor AI systems from the outside. For instance, black-box assessment might be able to detect unexpected outputs but it is incapable of discovering whether it is because of training data, building models, or other elements (Casper et al. 2024). This drawback constrains the accuracy of AI auditing and impairs the improvement of this technology in the auditing industry.

Therefore, our research contributes to the above AI and auditing literature by reviewing comments from social media users who use various channels to give their opinions to further study how different social groups perceive the roles of AI technologie. Conducting this

research, we draw on the concept of epistemic trust defined by Wilholt (2013) to analyze to what extent different social groups are willing to accept this emerging technology.

3. Theory

The concept of epistemic trust is used as a fundamental element to understand how trust plays its role in various social contexts regarding communication and information sharing. McCraw (2015) made a definition of epistemic trust which refers to the trust put in others' knowledge and expertise, which is vital for effective communication of information required for informed decision making. According to McCraw (2015), in social settings where individuals need to place trust in others' judgements and expertise, this form of trust is of great value for its foundational role in transmission of professional knowledge, underpinning our reliance on experts and professional institutions. McCraw (2015) pointed out that epistemic trust consists of several significant elements: the trustworthiness and credibility of the information resources, and integrity of the communicator. With the contribution of these elements, the reliability of information can be maintained. McCraw (2015) also discussed current challenges that epistemic trust is now facing and they are probably caused because of the misinformation and varying quality of information. To tackle these issues, it is imperative to make regulations to assess the credibility and quality of information (McCraw, 2015).

In our theoretical framework, we focus on the concept of epistemic trust as it also applies to artificial intelligence (Alvarado, 2023). Alvarado (2023) researched trust in AI and how it affects its integration into various industries, such as healthcare, financial services, and transportation. He stated that the current approach to conceptualizing trust fails to articulate the nature of trust in AI in the auditing industry. Alvarado (2023) drew on discoveries from areas of philosophy, ethics, and technology and proposed the main question: *what kind of trust does AI deserve?* His research was built upon the theory of epistemic trust defined by Wilholt (2013), and he discovered that AI can only be assigned epistemic trust if there is a certain type of adequate trust that needs to be given to this emerging tool. Alvarado (2023) focused on how to assign trust to AI systems and found out that traditional approaches are incapable of explaining the process, and he therefore introduced the concept of epistemic trust. In the area of AI auditing, epistemic trust stresses the idea that AI systems should be

more focused on knowledge production rather than over-reliance on the results. Alvarado (2023) made the distinction between rational trust, affective trust, and normative trust, and he stressed that epistemic trust represents a quite unique form of trust. In order to further analyze the nature of trust in AI, Alvarado (2023) also centered on how AI tools interact with trust and technology within a framework of epistemic trust for better comprehension. However, while Alvarado (2023) contributes to the conceptual foundation of epistemic technology and trust, the lack of empirical studies impedes a comprehensive understanding of how these elements perform in the real business world; therefore, further practical studies are needed for a more holistic comprehension of trust dynamics in AI..

Bedué and Fritsche (2022) found out that in order to reduce uncertainty and increase trust in AI, issues regarding knowledge acquisition, transparency, understandability, and guidelines need to be given great attention. Efe's (2023) study concluded that while AI is helpful in increasing the accuracy and efficiency of audits, as well as detecting fraud and risks, it still faces several challenges, such as ethical concerns or over-reliance on AI technologies. Besides, since it is an emerging field, discourse on the lack of expertise of auditors also begins (Efe, 2023). Munoko et al. (2020) discussed the implications of AI auditing from a conceptual perspective, and they pointed out several concerns regarding data privacy and algorithm bias. These issues are at the center of the topic because they directly affect the trust and reliability of auditing assisted by AI. Moreover, the over-reliance on AI can turn highly skilled auditing practices into low-skilled ones, which can further decrease trust in AI auditing. For instance, the 'black box' nature of many AI systems also inevitably leads to a lack of trust (Casper et al., 2024). Seethamraju and Hecimovic (2023) made use of the technology-organization-environment (TOE) framework to investigate factors influencing the integration of AI into auditing practices. Among these factors, the organizational and environmental ones have obvious relationships with auditors' acceptance and trust. The extent of audit firms' willingness to integrate AI into their businesses directly affects the amount of trust placed in AI systems. Factors that impact the readiness of the adoption of AI within the auditing industry include infrastructure level and employee competency. In addition, the understandability of regulatory guidance and audit standards and the compliance of audit firms play a significant role in shaping auditors' trust in AI applications in auditing.

Understanding AI in auditing from an epistemic trust perspective suggests that the degree of auditors' trust in AI auditing may be affected by how they perceive the integrity and transparency of AI auditing. Besides, auditors' commitment to mastering the technologies and using them correctly and ethically also contributes to auditors' acceptance. Another key role in maintaining epistemic trust is policy and governance. Examining whether current governance frameworks are robust to make sure that AI used in auditing follows high ethical and operational standards and whether existing policies can enforce accountability, data privacy, and transparency is critical to understanding how the auditors trust AI used in auditing.

4. Methodology

Although our original research question was *How is the use of AI in auditing perceived in social media?* We discovered that users particularly mentioned their working experience in the auditing industry and it shows that mainly the auditing practitioners focus on how AI is applied in their work life and how it affects their career path. Therefore, we changed our research question to *How is the use of AI in auditing perceived by auditors in social media?* to provide more accurate results.

This study employed a qualitative research approach to investigate how the auditors, mainly on social media, perceive the use of AI in audit. This is a complex phenomenon, to understand it requires our research to be concentrated on words. The exploratory nature of qualitative research allowed us the flexibility to understand the uncharted area of interest. Qualitative study also enabled us to see through the eyes of people who actually experience the phenomenon under study.

Our study was inductive. We started with observations from various sources including social media and Q&A sites. Then we identified patterns and themes from collected data. Based on the patterns and themes identified, we developed generalizations in the form of coding which help to make sense of our observations. Finally, we developed a conceptual framework grounded in empirical evidence, which explains the phenomenon under study.

Our research followed the approach of interpretivism, which emphasizes understanding a phenomenon from the individuals involved. Because the objective of this research was to understand how our research subjects interpret the topic under study, based on their own experience, beliefs, and cultural backgrounds, rather than imposing external explanations.

This study employed a content analysis approach to identify how the use of AI in audit is perceived among the auditors on social media. Even though in most studies, researchers choose to adopt interview analysis for analyzing professional perceptions in terms of the auditing industry, we decided on content analysis as it provides certain distinctive advantages regarding our research purpose and problems. Firstly, a content analysis can provide a systematic approach to analyze qualitative data, offer a wide range of insights that ensure relative objectivity into the content, and enable us to identify the common theme from the data studied in a structured manner. Secondly, compared to interviews, content analysis might offer a more flexible and less restricted approach to collect and study various perceptions. In interviews, interviewees can only provide limited information due to corporate confidentiality and it is challenging to conduct massive interviews while content analysis allows researchers to scrape larger volumes of data and therefore collect more various perceptions than interview analysis. Thirdly, as the internet creates a dynamic environment for discussions, we can gain deep insights into how ideas regarding AI auditing evolve over time and observe technological trends in the auditing field. Lastly, a content analysis approach is faced with fewer limitations such as sample size or geographic boundaries that interview analysis might be exposed to. Therefore, we intended to conduct content analysis instead of interview analysis because it is more suitable for our research purpose and problem.

Reygaerts et al. (2024) adopted an approach that collected and systemically reviewed data from a forum named Reddit. In this research, researchers categorized multiple themes based on the user-generated content from Reddit to study the use of cannabis. Drawing from this research, we adopted a similar method as we also intend to conduct analysis by extracting information from forums and that this methodology shows that social media platforms can also be used to provide insights into certain areas during various periods, which matches our research design. According to Blake et al. (2024), they made use of software tools for their research, also systematically scraping and systematically textual information from Reddit. With a structured research framework, this approach also allowed them to identify different themes and critically reflect on the findings. Inspired by the research design adopted by

Reygaerts et al. (2024) and Blake et al. (2024) , we came up with a methodology that is designed to extract posts/comments from different platforms such as Reddit, Quora, and Weibo by a research tool named MAXQDA in order to comprehensively discuss how AI auditing is perceived by audit professionals in the business world. We also categorized the findings to further analyze the specific aspects of this emerging trend such as being in different cultural and geographical contexts.

We utilized posts as our source of data due to the following reasons. Serving as an informal site for people to state their opinions, posts are often made in an untraditional and variable style as users constantly use emojis or buzzwords, providing a unique and more authentic view into the auditing industry. Besides, unlike interviews, anonymity allows more candid expressions as internet users are free from confidentiality and they are capable of revealing more sensitive contents regarding the AI auditing industry. Moreover, since most posts usually have themes and provide online places for people to discuss certain topics, we can expect active interactions and engagements from website users who work as audit professionals through this and other approaches such as comments, retweets, or likes. Compared to analyzing posts, it is more likely to get individual opinions through interviews as they mostly involve single interviewees in one round, however, it is the opposite case for studying posts since many users can share their views on one single topic/question. Despite the advantages of analyzing posts, certain potential biases also need to be discussed. To start with, there might be a selection bias because of the anonymity. As users can choose to reveal their own identities at will, it is challenging to discover their characteristics such as nationalities or ages. For instance, the young generation might dominate certain discussions, causing a false representation of the use of AI in auditing and age demographics. Besides, as users are allowed to express their thoughts at liberty, there is a possibility that misinformation might be spread and discussions are likely to be manipulated, leading to distortions in the data. Additionally, different platforms might also have their own distinctive discourse culture or environment that shape the way posts/comments are made, and under this circumstance, the language or the tones might be different as well, impacting our analysis. Finally, cultural factors can also play a significant role in this study. Different cultures might perceive AI auditing differently due to various cultural nuances and it also affects the way these social media users express their ideas through these platforms. For instance, we scraped posts from two social media platforms, which are Reddit and Quora, where most users express their opinions in English, and a Chinese platform named Weibo. From the analysis process, it can

be observed that these users focus on different aspects around the topic of AI auditing while they share some similar ideas regarding this area.

We analyzed data from various sources including posts from social media all over the world but primarily from China and the US including Weibo and Reddit. Q&A sites like Quora are also part of the data collection. In addition, media news, website articles, and regulatory documents serve as sources as well. Due to the anonymity and given the fact that English is a widely spoken language, it is hard to precisely identify the nationality of the users on platforms of Reddit and Quora even though they are launched in the United States. However, given the data provided from two reports by Fabio (2024) and Rohit (2023) it can be observed that although these two platforms enjoy a diversity of users, Americans are still the dominant users in these two platforms. It indicates that from a cultural perspective, the content and trends on these two platforms are mainly influenced and shaped by American users. Except for this, as these two social media platforms are designed and launched in the United States, they are regulated by the American governmental regulations, meaning that these two platforms are aligned with American culture. Taking these factors into account, it is believed studying these two social platforms can help us gain meaningful insights into how AI is perceived by American auditors on social media. As for Weibo, since mainly Chinese have access to this one of the biggest online platforms and most posts are made in Chinese, it is believed that it can represent a certain group of Chinese' perceptions on AI auditing. We used Google and typed keywords such as "AI", "Artificial Intelligence" and "Audit" to locate relevant resources. Then we categorize our resources to media news, website articles, and regulatory documents to assist our research. We also searched through social media posts using the following keywords: audit, AI, and Artificial Intelligence. Posts that discussed the specific impacts that AI has on their auditing career path, their attitudes towards AI and the reason why they hold such perceptions towards AI had the priority during data collection. Then we set the content collection into multiple categories based on e.g., recurring elements that give a preliminary understanding of the phenomenon. We next identified codes emerging from the content.

The coding process follows several indicators:

- (1) the topic of posts, such as whether the discussion is about AI and audit;
- (2) the attitude of expressions, such as negative tones expressed by modal auxiliary verbs like cannot;

- (3) the identity or profession of users, for instance, some users revealed their working experience in industries such as the auditing industry;
- (4) the reason or evidence offered, for example, some users cite statistics to prove their points.

Through the coded data, as the result, we portrayed the landscape of how the auditors on social media perceive the use of AI in audit. Together with this, we utilized the theory/concept of epistemic trust to analyze why the users on social media have these thoughts and the implication on the current auditing business and its future.

With the keywords including “AI” “Artificial Intelligence” and “Audit”, we scraped 486 posts based on filtering these words on Weibo (Chinese social media) and 138 posts on Quora and 34 Reddit from 2018-2024. As some posts do not show the dates when they were published, we are not able to specify the accurate time but only to show a time range. We eliminated posts/comments that contain links and reposts, because these posts/comments do not directly show how the users perceive AI in auditing or some are irrelevant to our research question as they are advertisements. After this filtering, we got 163 valid posts/comments coded as AI & audit, 97 from Weibo and 49 from Quora and 17 from Reddit. By valid posts/comments, it means these posts/comments contain at least one of the four indicators that we presented above so that we can ensure these posts/comments are relevant to our research question. Additionally, since one post/comment may contain various opinions about AI auditing, there might be some overlap when counting the number of posts/comments.

We used MAXQDA as our analysis tool for qualitative research for several reasons. Firstly, it allows researchers to process various types of data with text, images, audio, and videos. This softwares possesses functions that help researchers with advanced coding and it makes organization and analysis of large volumes of qualitative data easier. Besides, MAXQDA also has visualization tools to help researchers gain valuable insights into the data and present the findings more effectively. Its user-friendly supporting functions make it accessible for researchers of all levels and this is why we chose this software as our research tool.

According to Bryman & Bell (2011), content analysis is an approach to analyze textual or audio data to interpret information in a certain context and it involves significant steps to ensure its systematic nature. Conducting content analysis begins with a clear research

question that provides guidance on research and direction of what the content analysis intends to reveal (Bryman & Bell, 2011). The second step requires collecting representative samples of relevant documents or social media for analysis, and the samples should be relevant to the research questions and selected based on certain criteria such as time periods or certain characteristics of participants (Bryman & Bell, 2011). For example, when selecting information from newspapers, researchers might need to do it based on a certain time span to observe changes in certain industries. The third step is to decide what should be counted and it requires actors, words, themes, and other elements of analysis (Bryman & Bell, 2011). After this, it is critical to code these elements, which requires a comprehensively designed coding schedule and manual that states clear guidance for classifying data. Coding is important to content analysis because it is able to transform qualitative data into quantitative ones for research purposes. Therefore, ensuring the credibility and accuracy of coding is critical and it can be achieved by consistency checks, such as inter-coder reliability which means that various coders share the same coding and collect data to make interpretations standardized and uniformed (Bryman & Bell, 2011). Content analysis is helpful in processing a large amount of data and reliability which allows the verification of findings. But it also has certain limitations because coding can be a subjective process and biases can occur, which might lead to missing deep meanings of the content (Bryman & Bell, 2011). However, content analysis is still considered an effective method for systematic examination and clear interpretation of complicated data to acquire a deep understanding of the AI auditing field.

5. Ethics

Although the data that we collect are publicly available on social media websites such as Quora, Reddit, and Weibo, we still intend to protect some users' privacy by paraphrasing their comments. This approach involves changing certain expressions but still maintaining the most original meanings of the comments (Ayers et al ., 2018). This approach is intended to prevent the reverse identification of social media users, which is a significant concern regarding social media studies (Ayers et al ., 2018). According to Ayers et al ., (2018), direct quotes and usernames included could easily make users' identity revealed and their comments located, impairing their privacy. In order to prevent this, we will refrain from using direct quotes and presenting usernames in our results. Instead, we plan to rephrase the content that we cited and maintain the original meanings to accurately convey the intended message

without revealing users' identities. Examples of paraphrasing include changing words, such as *info* to *information*. By doing this, users who make comments collected by us will be more difficult to identify. Moreover, since some posts are in Chinese, we also managed to translate them to English and keep their original meaning. As some users' names in Chinese are hard to translate, we numbered them and presented them in respective numbers for examples of quotes. This strategy is critical to maintain the integrity in academic research related to social media, ensuring that participants' privacy will be protected to the greatest extent.

6. Empirical Data Discussion

6.1 Limitations in AI Auditing

Among the 49 valid posts/comments reviewed from Quora and 17 from Reddit, the most frequent idea about AI auditing is the limited use of the tool, which is also mentioned in 17 posts from Weibo. Negative opinions on AI auditing range from (1) ethics use and trust in AI, (2) risk of errors, (3) massive outsourcing, and (4) professional/personal judgements required.

Thirty-three posts/comments express their concern regarding professional judgements which are not AI-driven (Further discussed in 6.5). In their statements, although some recognized that certain low-level activities will be replaced, financial reporting standards are one of the factors that require human supervision to be a significant part of auditing procedures and it prevents auditing from being completely automated.

There are certain repetitive activities which firms try to replace with AI, but lots of high-value, judgment-based jobs are still performed by humans.

(User Its***o)

In the era of big data and AI, auditors stand at the intersection of Accounting and Technology. However, the auditor's principle: professional judgment, skepticism, and ethics will never change.

(User 52)

Add in the fact that some will need to make professional judgements, which will not be based on AI, unless all the financial reporting standards around the world are remade, someone will provide the AI parameters that need to be assessed.

(User L***o)

Nineteen posts/comments discuss the limited use other than professional judgments, and their ideas center on problems such as technical issues.

It can't be observed that the invoice date is not the delivery date with the perfectly set-up systems to check that and obtain the information.

(User ti***in)

The JET test process is still too stupid... When can AI become reliable and practical in auditing?

(User 11)

Three posts/comments specified the ethical concerns and privacy issues that they found out when using AI. Since one of the purposes of AI is to process large volumes of data, there is a high possibility that its impacts will affect people's lives which makes it important to use it ethically and wisely.

What AI tools that you are using that you can trust with your data? I use ChatGpt occasionally to get ideas but not much beyond that because of data privacy concerns.

(User fli**om)

6.2 Assumptions of AI

Twenty-six posts/comments discussed their expectations towards AI. In their comments/posts, some presented their observations on how AI is invested in well-known auditing firms such as Big 4s; some expressed their attitudes that decades years from now, many occupations will be automated, however, it is only a low possibility that auditing will be completely replaced by AI. Posts/comments that don't think the audit will be replaced made the following statements.

The audit process, in my view, is not about decision-making but is a predefined procedure reliant on management's controls. Therefore, while the audit process can be automated, it cannot be fully executed by AI. Even hypothetically, if a machine learning AI were employed to conduct an audit, it might make similar mistakes and exhibit the same biases as humans.

(User CA Kar*****n)

This text suggests that the audit process is not inherently about decision making but it is more like a model operated by management controlled by humans. This implies that even though parts of audit procedures can be automated, human inference is still needed. Since some decisions are still made by humans, biases and errors will still exist even when AI is used.

Aren't many large AI models very powerful now? They can read two million words of information and then sort out the main points. I think it is possible to develop an AI application, read the financial reports, announcements, information, etc. of listed companies in batches, screen out all problems with AI, and then manually audit them, so as to eliminate many financial fraud.

(User 1)

I'm speechless. It has been said that AI will replace accounting for so many years. How come that I still personally do the work that is suitable for AI? I support AI taking over all correspondence business.

(User 43)

Generally speaking, by combining artificial intelligence with blockchain, stronger information security, higher transparency and stronger auditing capabilities can be achieved, thus improving the reliability of applications.

(User 72)

After reading more than 500 pages of audit reports, I wonder when there will be artificial intelligence assistance.

(User 90)

The 4 texts above make clear that some steps in the auditing procedure are given high hope to be conducted or assisted by AI tools. One thing in common among these posts is that auditors yearn for only the labor-intensive auditing activities to be carried out by AI. Human inference stays dominant during the whole process.

6.3 Utility in AI Auditing

Twenty-two posts/comments talked about the practical implementation of AI in the auditing industries and how it improves efficiency of auditing. In these posts/comments, practitioners stated that they occasionally use AI to rephrase reports or acquire ideas on risk assessment. They also pointed out that some firms are actually trying to replace low-level activities with AI.

AI in tax management can simplify the audit process and lessen the risk of non-compliance penalties by automating data collection and analysis, detecting potential errors, and offering real-time insights. This ensures accurate and timely reporting, reduces effort, and minimizes human error, ultimately enhancing compliance and decreasing the risk of penalties.

(User S** H**)

There are few opportunities for applying Chat GPT at work. However, there was an audit report today that required me to form a report on the vegetation cover, height and hay production data for 2018-2022. I found that to transform data to text, AI is still quite good, and half a day's work was completed in a few minutes. Continuing to explore other application scenarios in the future!

(User 27)

6.4 Clarification on Automation vs. AI

Ten posts made a distinction between AI and automation for they think many people mistake automation for AI and it might lead to biased consequences regarding implementation of actual AI tools.

Real AI doesn't have much use in auditing. What people often call AI is typically a set of predefined filters and patterns that generate data. These tools don't actually learn or improve

over time; they simply identify the same issues repeatedly. Calling this process 'automation' would be more accurate.

(User Ri**an)

The above comment implies that the current tools labeled AI are not actually intelligent because they still lack the ability to learn and adapt themselves to working environments. Instead, they still work in fixed patterns which sets a distinction between them and actual AI.

6.5 Replacement of Human Auditors

The most discussed topic from 97 Weibo posts we filtered was AI's impact on the audit profession which is, to be specific, the replacement of human auditors. There were 79 posts involving the topic of substitution, among which were 23 posts agreeing with replacement, and 35 posts believing that it is irreplaceable.

Those who believe that AI will replace humans in audit commonly take the nature of audit procedure as their reasons. Most of them perceive that auditing work is repetitive and standardized, which is easy for AI to learn and manage in the near future. The quotes below capture the users' understanding of the characteristics of auditing.

I've only been learning about the AI sector for two weeks, but already I get the impression that AI will eventually replace a lot of paperwork and financial tasks, including the audit industry.

(User 5)

AI will replace jobs that are easily standardized or single content, like photography of painting, graphic modeling, translation, auditing, tour guide, cleaning, and entry-level roles in many industries. [...] AI will have difficulty replacing someone in such a job as long as the service object is complex, flexible, and difficult to standardize.

(User 29)

Some routine, highly repetitive work that requires a lot of data processing may be automated. For example, customer service representatives, warehouse and logistics workers, account and auditors, manufacturing assembly workers, bank tellers, restaurant attendants, security and monitors, taxi drivers and other occupations may be affected.

(User 56)

The current audit practices rely heavily on standardized and repetitive tasks. The calls and practices for the reform of audit have existed over 70 years, but the core of these reform proposals has never been the audit itself rather than how to ensure the compliance with established standards (Humphrey et al., 2021). Such an approach might limit the potential of audit to deliver more value and even reduce audit to mere a compliance function. According to the above quotes, auditing, at least the main body of it, is still perceived as a set of standardized procedures. Such a perception may lead to a greater acceptance or even fear among auditors that AI could replace much of the mundane and repetitive parts of their work. Meanwhile, this acceptance or fear among auditors can harm the epistemic trust put in their expertise by the auditors.

Some other posts indicating the replacement contain the negative attitude towards the future of auditing and the disappointment about the current audit works.

I had been learning the risk of auditing for an afternoon. It was disgusting. AI, please replace humans.

(User 16)

Is there a promising future being an auditor? No. It will be replaced by AI after all.

(User 19)

Sometimes I feel frustrated that why not just let me be replaced by AI. Auditing is not for a human being. I'm afraid it would hurt a lot even for AI. There is no limit of lifespan for AI, but one life for a human being.

(User 97)

Users of above quotes applied negative tones to express their disappointment about the status quo and the future of audit. It may appear to be a bit dramatic about their phrasing regarding

being replaced by AI, but the point was clearly made. People who are pursuing the career of auditing find it difficult to learn professional skills and acquire expertise. Such disappointment comes from, on the one hand, the fact that most auditing tasks are dull due to the standardized and repetitive nature. On the other hand, the gap between the traditional audit training procedure and the rapid development of AI technology, especially those adopted by audit clients. Some novice auditors also find it challenging at the lower level of the auditing industry. Their suffering from the assignments is partly caused by, repeatedly mentioned, the repetitiveness and standardization of audit, while it could also be attributed to the lack of competence and expertise of auditors themselves. These perceptions bring some doubts on the future of auditing, and more seriously, the reduction of the auditor's epistemic trust on the audit profession. The loss of auditors' trust is inevitable if the auditors don't even trust themselves and the future of their profession.

Among 35 posts believing it is irreplaceable, there are predominantly 21 posts that hold the same opinion. Here are some examples:

#The Ministry of Finance punishes Deloitte and Huarong # Accounting and auditing don't have to worry about being replaced by AI at all. After all, robots can't go to prison.

(User 38)

#Audit# Indeed, the audit is a position that Ai can't replace. After all, Evergrande faked 500 billion this time, and PWC had to send a few people (into the prison).

(User 4)

Why can't AI replace the auditor? Because AI can't sign and go to prison.

(User 31)

AI cannot go to jail for humans. This common understanding on the relationship between AI and humans emphasizes one topic: responsibility. Sparked by some major failures of big audit firms, the discussion about the audit firm's responsibility was wide. People's perception that human auditors' fight against the AI's substitution could only be successful when it comes to the auditing failure reveals that auditing has been downsized to that mere signature and the role of scapegoat. It also indicates that the laws and regulations surrounding the use of AI, especially those pertaining to accountability, remain unsound. The auditor's epistemic trust in

the audit's use of AI has been weakened by these constraints on the audit function and flaws in AI legislation.

Thirteen posts talked about human auditors' professional judgment and expertise.

I don't think that many high-value jobs, such as programmers in technology companies, data analysts, or basic academic research, can be completely replaced by AI. ChatGPT can help us conduct efficient business analysis, but why do we need to do this analysis? What is the practical significance of the results of this analysis? And is the original data of this analysis true and credible? These original, critical, non-objective insights and reflections are not available to AI.

(User 22)

Will the industry of accounting and finance decline in the future? # Do you know what the most professional skills are used in the process of accounting auditing practice? Professional judgment. If AI can perform accounting professional judgment one day, I think all fields can be taken over by AI.

(User 51)

Recently, artificial intelligence and ChatGPT have become very popular, and there is also a post on the internet about the professions that will never be replaced by AI, including investment banks, accountants, lawyers, audit appraisers, independent directors, etc., because AI cannot go to prison for these practitioners. But the above professions also have a core competitiveness, that is, the unique ability to interpret unspoken rules and the ability to collude and find potential relationships. Can AI replace these?

(User 74)

[...]In big four, accounting computerization is very common, but senior accountants pay most attention to professional judgment ability. Whether it is tax or audit, it is a good choice. Will you let artificial intelligence go on a business trip? In reality, accounting is not only financial statements, but also communication and management skills are very important[...]

(User 86)

The above quotes pointed out that the professional judgment is exclusive to human auditors. In particular, the skill of communicating plays a crucial part in the auditing business, as there are multiple parties involved in the whole process, and the relations between individuals as well as interest groups can be subtle but potentially game-changing. These subjective opinions and reflections are the key that separate AI and humans, and even the pivot for human auditors to master the AI tools and alter them for the benefit of shareholders.

6.6 Discussion of Findings

The posts/comments that we collected about AI auditing reflect a wide range of opinions about how AI is perceived by practitioners in the auditing industry, implying limitations of integration of AI into actual auditing procedures. Our research provides insights into this field by leveraging the theory of epistemic trust to critically review the posts/comments. Epistemic trust refers to the process of putting trust in others' professional knowledge, which contributes to effective transmission of information. McCraw (2015) argued that epistemic trust consists of belief, communication, reliance and confidence, which are important elements for both reliable information and sources. Applying this concept in our research makes it clear that stakeholders should have trust in AI's capabilities to analyze data accurately, which is a significant issue that exists in the auditing industry. The following table presents a summary and a few examples of the sources of the posts, comments and relevant themes.

Table: Examples of Sources of Posts/Comments and Relevant Themes			
Posts/Comments	Platforms	Subcategories	Themes
<i>There are certain repetitive activities which firms try to replace with AI, but lots of high-value, judgment-based jobs are still performed by humans.</i>	Reddit	Professional judgment	Limitations in AI Auditing
<i>The JET test process is still too stupid... When can AI become reliable and practical in auditing?</i>	Weibo	Technical issues	

<i>What AI tools that you are using that you can trust with your data? I use ChatGpt occasionally to get ideas but not much beyond that because of data privacy concerns</i>	Quora	Ethical and privacy concerns	
<i>The audit process, in my view, is not about decision-making but is a predefined procedure reliant on management's controls. Therefore, while the audit process can be automated, it cannot be fully executed by AI. Even hypothetically, if a machine learning AI were employed to conduct an audit, it might make similar mistakes and exhibit the same biases as humans</i>	Reddit	Intrusive thoughts towards AI auditing	Assumptions of AI
<i>Generally speaking, by combining artificial intelligence with blockchain, stronger information security, higher transparency and stronger auditing capabilities can be achieved, thus improving the reliability of applications</i>	Weibo	Prospects towards AI assistance	
<i>After reading more than 500 pages of audit reports, I wonder when there will be artificial intelligence assistance</i>			

<p><i>AI in tax management can simplify the audit process and lessen the risk of non-compliance penalties by automating data collection and analysis, detecting potential errors, and offering real-time insights. This ensures accurate and timely reporting, reduces effort, and minimizes human error, ultimately enhancing compliance and decreasing the risk of penalties</i></p>	<p>Quora</p>	<p>Automating audits and reducing errors</p>	
<p><i>There are few opportunities for applying Chat GPT at work. However, there was an audit report today that required me to form a report on the vegetation cover, height and hay production data for 2018-2022. I found that to transform data to text, AI is still quite good, and half a day's work was completed in a few minutes. Continuing to explore other application scenarios in the future!</i></p>	<p>Weibo</p>	<p>Efficient data transformation with AI.</p>	<p>Utility in AI auditing</p>

<p><i>Real AI doesn't have much use in auditing. What people often call AI is typically a set of predefined filters and patterns that generate data. These tools don't actually learn or improve over time; they simply identify the same issues repeatedly. Calling this process 'automation' would be more accurate.</i></p>	<p>Reddit</p>	<p>Misconceptions about AI</p>	<p>Clarification on Automation vs. AI</p>
<p><i>AI will replace jobs that are easily standardized or single content, like photography of painting, graphic modeling, translation, auditing, tour guide, cleaning, and entry-level roles in many industries. [...] AI will have difficulty replacing someone in such a job as long as the service object is complex, flexible, and difficult to standardize.</i></p>	<p>Weibo</p>	<p>General understanding of AI</p>	<p>Replacement of human auditors</p>
<p><i>Sometimes I feel frustrated that why not just let me be replaced by AI. Auditing is not for a human being. I'm afraid it would hurt a lot even for AI. There is no limit of lifespan for AI, but one life for a human being.</i></p>	<p>Weibo</p>	<p>Pessimistic opinions about future auditing work</p>	
<p><i>Why can't AI replace the auditor? Because AI can't sign and go to prison.</i></p>	<p>Weibo</p>	<p>Accountability in the auditing industry</p>	

<p><i>Add in the fact that some will need to make professional judgements, which will not be based on AI, unless all the financial reporting standards around the world are remade, someone will provide the AI parameters that need to be assessed.</i></p>	<p>Quora</p>	<p>Rejection to the replacement of AI auditing</p>	
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6.6.1 Automation in Auditing

Several comments pointed out the distinction between automated tasks and those which can be performed by real AI or human judgment, which implies that high-value jobs are still in the domain of auditors instead of real AI. While AI is useful in repetitive work such as data entry, it only satisfies the minimum requirements of audit. However, when it comes to jobs requiring accurate judgment or ethical concerns, human auditors' roles cannot be replaced by AI, for their ability to make complex decisions based on their own distinctive experience and understanding. Besides, according to comment made by *User CA Kar****n* and User 5, the audit process is still dependent on human cognition, suggesting that although automation can streamline certain tasks, AI is still incapable of the whole audit procedures and it might replicate human errors as well.

This aligns with the concept of epistemic trust (McCraw, 2015) , and it implies that auditors are trustworthy for their irreplaceable expertise and professional judgment, while AI is not capable of complicated decisions, which plays an important role in maintaining trust in audit practices. From an epistemic trust perspective, in order to have AI trusted by stakeholders, it at least needs to demonstrate the ability to stay reliable and competent. However, if AI in the auditing industry can only perform automated operations , which is not even considered as AI according to some users, and replicate human biases, it impairs the basic elements of epistemic trust such as belief, communication, reliance and confidence (McCraw, 2015).

6.6.2 Potential in AI Auditing

User S** H** argued that AI has the potential to make data collection and analysis concise. Fundamental tasks as data collection involve mistakes occasionally when they are performed manually. With the implementation of AI auditing, not only can human errors be reduced but also human auditors are able to have more time tackling other issues requiring advanced human judgment, improving efficiency. The fact that AI can process large volumes of data accurately also leads to the increase in reliability of audits, contributing to more accurate financial reporting. Except for this, one of AI's strengths is to offer real-time feedback, continuously monitoring operations. This function provides a proactive approach helping detect mistakes in early stages and minimize losses. Applying the notion of epistemic trust (McCraw, 2015), regulatory mechanisms should be set to maintain the trust in AI so that it can be further used in the auditing industry. In order to achieve this goal, Manheim et al. (2024) prompted the idea of the AI Audit Standards Board which is responsible for improving auditing standards, ensuring high quality audit procedures and sustaining auditors' trust in AI.

6.6.3 Risks in AI Auditing

Despite the advantages discussed in *Potential in AI Auditing*, it should be noted that some hidden risks might cause huge losses and regulations should be set up for precaution against this. For stakeholders to trust AI auditing, the operation process should be transparent and understandable, however, AI's decision-making process is often considered a "black box", lacking transparency (Casper et al., 2024). Under this circumstance, it is critical to ensure the rationales of audit results are clear, otherwise AI might lose epistemic trust (McCraw, 2015) as its components, such as belief and reliance, might be undermined. In order to accomplish the objective, AI tools should be developed to provide clear and understandable explanations for its analysis and regular checks of AI are also required to make sure its operations are in compliance with regulatory standards.

6.6.4 Economic Impacts of AI Auditing

User 56 and User Ri**an discussed the potential economic impacts brought by AI auditing regarding job markets. According to their arguments, even though AI can manage certain

repetitive tasks, it is still insufficient to replace all the auditing jobs, especially those requiring professional judgment. However, the fact that automation is becoming a trend will put some people out of employment, leading to increasing unemployment. Meanwhile, as there is an increasing demand for people skilled at AI systems, new occupations will also emerge to meet this expectation. From an epistemic trust perspective (McCraw, 2015), auditors' expertise and personal judgment cannot be completely replaced, implying that it is not easy for epistemic trust put in auditors to be transferred to AI tools given the current limitations and potential risks. Auditors' involvement is critical for an accurate audit process, therefore, the future of the job market might require employees to be equipped with multiple expertise including AI knowledge and auditing skills such as professional judgment. This collaboration between AI and auditors ensures that the AI-driven auditing process is transparent and accurate to the greatest extent.

6.6.5 Cultural Perspectives on AI Auditing

From section 6.5, we noticed that the major difference in the center of the topics in terms of AI auditing among the posts in various social platforms is accountability. As is mentioned in section 6.5, there are 21 Chinese posts stating the same idea that AI cannot replace human auditors as it cannot be put into prison, however, it is quite rare to see similar perceptions on Reddit and Quora. Auditors are sent to prison as they fail their responsibility, and it can then be discovered that the main idea of these example posts scraped from Weibo is auditing accountability. Compared to Weibo, we didn't discover many posts that involved prison/jail in the discussion from Reddit and Quora, while the majority of the posts from these two platforms were more focused on professional judgment in terms of the possibility of replacement of human auditors by AI as is described in section 6.5.

Epistemic trust (McCraw, 2015) refers to the theory that one individual relies on someone else as the source of information for their expertise and professional attitudes. This theory is focused not only on the reliable information but also on the professional values of the information providers. In this research, the theory is applied to study how auditors' perceptions can be influenced by the epistemic trust that they put in AI technology and the professionals who develop those intelligent tools. Studying the posts/comments auditors made on social media offers less restricted insights compared to interview research as

interviewees' opinions might be constrained due to corporate policy, and it is also challenging to collect massive data through this approach.

Cultural factors affect the level of the epistemic trust auditors put in AI auditing (Nolder, 2014). American culture is pictured as a representative of individualism, where people are encouraged to perform and think individually to challenge existing technology or regulations (Saiewitz, 2020). In this sense, auditors in the United States are more likely to place more value on individual accountability and credibility of information, leading to more demand for transparency in AI techniques. Other than this, the US is also characterized by lower power distance (Saiewitz, 2020), which means that Americans intend to accept open communications and equal power distributions. In the context of this research, it can be seen from the posts/comments from Reddit and Quora that Americans' attitudes towards AI auditing is aligned with their value of individualism, where they emphasize the importance of professional judgment and question the application of AI in the auditing industry. As is found from most posts from Reddit and Quora, American auditors discovered that most nominal AI technologies are actually tools used for repeated work, which lack the ability to conduct professional judgment and verify information. In this scenario, most American auditors find it hard to place epistemic trust in the AI-based auditing technologies since it might lead to failure of professional judgment and they express their skepticism towards the tool through social media. For example, user Ri**an stated that a lot of people mistake automation for artificial intelligence, pointing out the fact that AI is not as useful as most practitioners think and also having challenged this trendy tool. It also shows that American auditors still value human oversight and professional judgment to avoid potential mistakes even though they are embracing AI auditing.

On the contrary, Chinese social media is more regulated and it often promotes the value of social harmony and collectivism (Saiewitz, 2020). In Chinese culture, Chinese auditors are encouraged to prioritize groups' interests over individuals, which leads to great emphasis on collective responsibility. In professional settings, this culture is also in great need of epistemic trust in the auditing process as auditors pursue accurate and reliable audits to minimize the loss to the whole auditing group. Compared to the United States, Chinese culture is more hierarchical and characterized by higher power distance, which means that authority is in a dominant position across many industries. Therefore, auditing practitioners might defer to authorities and feel a great sense of responsibility and duty to comply with the

industrial regulations (Saiewitz, 2020). When AI technology fails to conduct proper audits, Chinese auditors are more concerned that AI cannot be held accountable in the same way as human auditors do. In Chinese social media Weibo, auditors express their rejections to AI auditing with this reason which is most likely not allowed to be brought up in interviews in Chinese companies. It is also one of the main reasons that this research is conducted using content analysis instead of interview analysis as mentioned in the section of methodology. It can be seen that Chinese auditors on social media put it in a humorous way that *AI cannot be used to replace human auditors as it is pointless to send them into prison* among 21 posts/comments. These perceptions reveal that in the Chinese auditing industry, the focus is more about holding practitioners accountable, and there are few posts/comments discussing professional judgment and how AI is actually used in the field or if there are some misconceptions regarding AI-driven technology in this industry. The hierarchical structure that exists in Chinese auditing culture leads to Chinese auditors' alignment with the collectivism culture, reinforcing the idea on social media that AI auditing in China will not be used to replace human auditors as it is incapable of fulfilling human auditors' accountability.

These various perceptions indicate that auditors from various cultures might be influenced by their own cultural factors and therefore put different amounts of epistemic trust in AI auditing (Nolder, 2014). By comparing these social platforms, it is clear that American auditors' resistance to AI auditing is based on their strong belief in irreplaceable professional judgment expertise. American auditors also express their skepticism towards AI auditing through social media as there is lower power distance in the American auditing field and they are encouraged to critically evaluate the existing system (Nolder, 2014). Based on the social media posts/comments, Chinese auditors refuse the possibility of replacement by AI auditing mainly because of accountability. As Chinese culture is highly collectivist and leader-centered, Chinese professional auditors tend to prioritize group harmony and put less trust in the AI-driven technology (Nolder, 2014). All these perceptions are intensified through social media platforms, and some opinions on AI auditing can only be acquired through social media since interviewees might be restricted by company policies.

7. Limitations

This thesis researches auditing practitioners' views of AI auditing through analyzing social media posts/comments. While our research offers valuable insights into this field, several limitations need to be stressed.

The analysis is only based on 163 valid posts after filtering and it only represents a small-size sample. Since AI is an emerging technology and it is still in the development stage, many practitioners only have limited knowledge, making it difficult to find large amounts of posts on this topic on social media. Although our sample provides a certain amount of data, it might not represent various opinions of all auditors, restricting the generalizability of our research findings. Moreover, as we collected data from multiple platforms, their opinions might be biased because different platforms could be characterized by different user groups with different backgrounds. For instance, Reddit might be less formal than Quora, making the posts/comments of Reddit more casual than Quora. Therefore, our research results cannot represent auditors who do not use these or don't use platforms.

We used MAXQDA as our research tool for our content analysis to code posts/comments and identify relevant themes, it is still affected by researchers' interpretations which influence the research results. Moreover, social media users often express their opinions out of specific events or unstable moods, which may not represent their objective attitudes on AI auditing. Additionally, MAXQDA also has certain technical limitations when processing data.

It is also an issue to identify the language and tone of each post/comment. Informal language is often used on social media and it can complicate the information that users want convey, which makes it tough to identify their intentions. Sarcasm and slang might make interpreters misunderstand the real meaning of the posts/comments. Moreover, there is always a dynamic environment on social media and it makes users' opinions change swiftly, which means that the data we collect might only represent only a short period of time.

We also find ethical considerations very important in our research. In order to ensure the privacy of the users that we investigated, we adopted a paraphrasing approach to process the posts/comments, which might limit our analysis and cause certain information to be missing or misinterpreted.

In summary, while this thesis contributes to auditors' perceptions on AI auditing, these limitations indicate that further cautious research is needed. To further enhance the conclusion, a large sample size and various data sources can be adopted to address these limitations.

8. Conclusion

Applying the concept of epistemic trust (McCraw, 2015) and doing content analysis with posts/comments from social media provide us with a unique perspective on how AI auditing is perceived by auditors in social media. Even though our initial purpose was to research how different occupations recognize this emerging intelligent tool, we discovered that mainly auditors or practitioners working closely with auditing discussed these issues on social media since they are part of an epistemic group. Therefore, we adjusted our research question accordingly. Our qualitative research reveals that while AI can enhance auditing efficiency and accuracy in repetitive tasks, it still cannot replace auditors completely for its lack of professional judgment which is now only possessed by human auditors. Epistemic trust highlights that in order to gain this type of trust, elements such as belief, communication, and confidence are necessary and this is what AI is short of, emphasizing the irreplaceable role of human auditors.

In order to offer deep insights into the field of AI auditing, we scraped posts/comments from cross-cultural social platforms which are Reddit, Quora and Weibo. To narrow down the scope of the research regarding AI auditing, posts/comments were filtered by searching words such as "AI", "Artificial Intelligence", and "Audit" both in English and Chinese for various social media. After reviewing the posts/comments collected, it is found that although English and Chinese digital platforms share similar perceptions, for example, certain jobs such as the repetitive ones will be substituted for AI-based auditing tools. However, it is also discovered that when it comes to the topic of AI replacement, auditors from different platforms showed multiple attitudes towards this trend. Auditing professionals who use Reddit and Quora stated that they think there is a slim chance of replacement as AI-driven technology cannot conduct professional judgment. One of the possible reasons that they hold this opinion is that they are affected by their culture of individualism and lower power

distance (Nolder, 2014). In contrast, even though Chinese auditors also expressed their negative opinions about the application of AI auditing, they have this belief because they are in a social environment characterized by collectivism and higher power distance, leading to emphasis on accountability (Nolder, 2014). Therefore, as AI cannot be held accountable, Chinese auditors also perceive human auditors as irreplaceable.

To make auditors put epistemic trust in AI auditing, challenges of reliability, transparency, and ethical concerns need to be overcome (Casper et al., 2024). While enhancing epistemic trust in AI auditing, auditors will continuously play a critical role in the effective auditing process and audit integrity, and jobs that require both AI and auditing expertise might also emerge. This integration represents a future research direction of the auditing field, for instance, how to ensure the trustworthiness of the auditing process with involvement of both AI systems and professional judgements.

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