Research Article

Bridging the Gap: A Literature Review on the Integration of Accounting Information Systems (AIS) into Mainstream Accounting Research

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Abstract: This qualitative literature review explores the integration of Accounting Information Systems (AIS) into mainstream accounting research. The study identifies significant barriers, including limited representation of AIS topics in mainstream journals and divergent research methodologies. Despite these challenges, the review highlights the growing importance of digitalization and emerging technologies, which present opportunities for AIS to significantly impact accounting practices. The findings suggest that fostering interdisciplinary collaboration, embracing methodological diversity, and developing a unified research agenda are essential steps toward achieving greater integration. This integration is crucial for harnessing the full potential of AIS research to drive innovation and address complex challenges in the digital age. The review also acknowledges limitations, such as the selection of articles and linguistic constraints, which may impact the generalizability of the findings.

1. Introduction

The field of Accounting Information Systems (AIS) has evolved over the past three decades as a significant subfield within the broader discipline of accounting. Despite its growth, there is a growing concern that AIS may become an isolated discipline, detached from mainstream accounting research. This potential divergence is particularly troubling given the increasing importance of digitalization and its profound impact on accounting practices (Jans et al., 2023). The integration of AIS into mainstream accounting research is crucial for ensuring the continued relevance and quality of research in both fields. This literature review aims to explore the current state of integration between AIS and mainstream accounting research, highlighting the challenges and opportunities for bridging the gap between these two fields.

The emergence of AIS as a distinct research area within accounting can be traced back to the increasing reliance on digital technologies in accounting practices (Murthy, 2016). As businesses increasingly adopt digital tools to enhance their accounting processes, the need for specialized research on AIS has grown. Digitalization plays a significant role in driving technological innovation in the micro, small, and medium enterprises sector (Chaidir, M., et al, 2024). However, despite its importance, AIS research faces the risk of becoming siloed, with limited interaction with the broader accounting discipline (Sutton, 2010). This isolation is evident in the limited coverage of AIS topics in mainstream accounting journals, which tend to focus on specific areas such as information disclosure, network technologies, and audit and control, while other AIS topics remain underrepresented (Jans et al., 2023).

The lack of integration between AIS and mainstream accounting research can be attributed to several factors. One possible explanation is the focus on archival studies in accounting outlets, which may not align with the diverse methodologies employed in AIS

research (Barrick et al., 2019). Additionally, the preferences for certain research topics and methods in each field may contribute to the perceived distance between them (Glass et al., 2004). This divergence in research focus and methodology can hinder the development of a cohesive research agenda that leverages the strengths of both fields.

The importance of integrating AIS into mainstream accounting research cannot be overstated. The digital transformation of accounting practices necessitates a comprehensive understanding of AIS and its implications for the accounting profession (Murthy, 2016). Without this integration, there is a risk that AIS research may become marginalized, leading to a deterioration in research quality and relevance (Sutton, 2010). Furthermore, the isolation of AIS research could result in missed opportunities for collaboration and innovation, which are essential for addressing the complex challenges facing the accounting profession in the digital age.

Several studies have highlighted the need for greater integration between AIS and mainstream accounting research. For instance, Sutton (2010) emphasized the importance of mutual understanding and acceptance between the two fields, arguing that AIS should be recognized as a viable part of accounting. Similarly, Murthy (2016) called for a more concerted effort to bridge the gap between AIS and accounting research, highlighting the potential benefits of a more integrated approach. Capacity development initiatives, such as training programs and educational resources, are essential for enhancing the understanding and professional competence of accounting professionals in implementing IFRS in Indonesia (Muhammad Rizal & Eri Kusnanto, 2021).

The challenges of integrating AIS into mainstream accounting research are not unique to this field. Similar tensions have been observed in other disciplines, such as computing, where subfields have struggled to achieve a cohesive research agenda (Glass et al., 2004). These experiences underscore the importance of fostering collaboration and understanding between parent fields and their subfields to ensure the continued relevance and impact of research.

To address the challenges of integrating AIS into mainstream accounting research, several actionable suggestions have been proposed. These include encouraging interdisciplinary collaboration, promoting the inclusion of diverse research methodologies, and fostering a culture of mutual respect and understanding between researchers in both fields (Jans et al., 2023). By adopting these strategies, the accounting profession can harness the full potential of AIS research to drive innovation and improve accounting practices.

The integration of AIS into mainstream accounting research is essential for ensuring the continued relevance and quality of research in both fields. The digital transformation of accounting practices necessitates a comprehensive understanding of AIS and its implications for the accounting profession. By fostering collaboration and understanding between AIS and mainstream accounting research, the accounting profession can address the complex challenges of the digital age and drive innovation in accounting practices. This literature review highlights the importance of bridging the gap between AIS and mainstream accounting research and provides actionable suggestions for achieving greater integration between these two fields.

2. Literature Review

The field of Accounting Information Systems (AIS) has been recognized as a vital subfield of accounting for approximately 30 years. Despite its importance, there is a growing concern that AIS might evolve into an isolated discipline, detached from mainstream accounting research. This potential divergence is particularly concerning given the increasing significance of digitalization in accounting (Jans et al., 2023). The amalgamation of AIS with the broader accounting research field is essential to ensure the continued relevance and quality of research in both domains (Murthy, 2016).

The emergence of AIS as a distinct research area within accounting can be traced back to the integration of digital technologies into accounting practices. This integration has necessitated specialized research to address the unique challenges and opportunities presented by digitalization (Murthy, 2016). The collaboration between artificial intelligence platforms and digital innovation hubs can enhance productivity, operational efficiency, and market access for SMEs (Eka Wahyu Kasih, et al, 2024). However, despite its significance, AIS research faces the risk of becoming siloed, with limited interaction with the broader accounting discipline (Sutton, 2010). This isolation is evident in the limited coverage of AIS

topics in mainstream accounting journals, which tend to concentrate on specific areas such as information disclosure, network technologies, and audit and control, while other AIS topics remain underrepresented (Jans et al., 2023).

Research suggests that the lack of integration between AIS and mainstream accounting research can be attributed to several factors. One explanation is the focus on archival studies in accounting outlets, which may not align with the diverse methodologies employed in AIS research (Barrick et al., 2019). Additionally, the preferences for certain research topics and methods in each field may contribute to the perceived distance between them. This divergence in research focus and methodology can hinder the development of a cohesive research agenda that leverages the strengths of both fields (Glass et al., 2004).

The importance of integrating AIS into mainstream accounting research cannot be overstated. The digital transformation of accounting practices necessitates a comprehensive understanding of AIS and its implications for the accounting profession (Murthy, 2016). Without this integration, there is a risk that AIS research may become marginalized, leading to a deterioration in research quality and relevance (Sutton, 2010). Furthermore, the isolation of AIS research could result in missed opportunities for collaboration and innovation, which are essential for addressing the complex challenges facing the accounting profession in the digital age.

Several studies have highlighted the need for greater integration between AIS and mainstream accounting research. Sutton (2010) emphasized the importance of mutual understanding and acceptance between the two fields, arguing that AIS should be recognized as a viable part of accounting. Similarly, Murthy (2016) called for a more concerted effort to bridge the gap between AIS and accounting research, highlighting the potential benefits of a more integrated approach.

The challenges of integrating AIS into mainstream accounting research are not unique to this field. Similar tensions have been observed in other disciplines, such as computing, where subfields have struggled to achieve a cohesive research agenda (Glass et al., 2004). These experiences underscore the importance of fostering collaboration and understanding between parent fields and their subfields to ensure the continued relevance and impact of research.

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3. Proposed Method

This literature review employs a qualitative approach to explore the integration of Accounting Information Systems (AIS) into mainstream accounting research. The methodology is designed to systematically identify, analyze, and synthesize relevant literature to provide a comprehensive understanding of the current state of integration between these two fields.

The process began with a comprehensive search of academic databases to identify relevant articles and papers published in the last two decades. The search terms included combinations of keywords such as "Accounting Information Systems," "mainstream accounting research," "integration," and "digitalization." This approach is consistent with the guidelines provided by Webster and Watson (2002) for conducting a thorough literature review.

To ensure the inclusion of high-quality and relevant studies, the selection criteria focused on peer-reviewed journal articles, conference papers, and seminal books that explicitly address the integration of AIS into accounting research. The initial search yielded a large number of articles, which were then screened based on their abstracts and titles to assess their relevance to the research question. This step aligns with the methodology used by Massaro, Dumay, and Guthrie (2016) in their structured literature review in accounting.

Following the initial screening, a full-text review was conducted on the selected articles to extract and analyze key themes and findings. The analysis focused on identifying patterns, trends, and gaps in the literature related to the integration of AIS into mainstream accounting research. This thematic analysis approach is supported by Braun and Clarke (2006), who advocate for thematic analysis as a flexible and useful method for identifying themes within qualitative data.

The review also involved the use of bibliometric analysis to examine the citation patterns and impact of AIS research within the broader accounting literature. This technique, as described by Merigó and Yang (2017), provides insights into the influence and reach of AIS research in the accounting field. By analyzing citation networks and co-citation patterns, the study aims to identify key contributors and influential works that have shaped the discourse on AIS integration.

To ensure the reliability and validity of the findings, the study employed a triangulation approach by comparing insights from different sources and methodologies. This approach is consistent with the recommendations of Rowe (2014), who emphasizes the importance of using multiple sources and perspectives to enhance the robustness of literature reviews.

This literature review utilizes a systematic and rigorous qualitative methodology to explore the integration of AIS into mainstream accounting research. By employing a combination of thematic analysis, bibliometric techniques, and triangulation, the study aims to provide a comprehensive and nuanced understanding of the current state of integration and identify areas for future research.

4. Results

The qualitative literature review on the integration of Accounting Information Systems (AIS) into mainstream accounting research reveals several key findings that highlight both the progress made and the challenges that remain in bridging these two fields.

Limited Integration in Mainstream Journals: The review indicates that AIS topics are underrepresented in mainstream accounting journals. The coverage tends to focus on specific areas such as information disclosure, network technologies, and audit and control, while other important AIS topics receive less attention (Jans et al., 2023). This limited integration suggests a need for broader inclusion of AIS research in general accounting literature to enhance its visibility and impact.

Divergence in Research Methodologies: There is a noticeable divergence in the research methodologies employed in AIS and mainstream accounting studies. While accounting research often favors archival and empirical methods, AIS research tends to employ a broader range of methodologies, including design science and case studies (Barrick et al., 2019; Murthy, 2016). This methodological diversity can be both a strength and a barrier, as it may hinder the integration of findings across the two fields.

Emerging Technologies and AIS Research: The review highlights the growing importance of emerging technologies, such as blockchain and data analytics, in AIS research (Dai & Vasarhelyi, 2017; Kogan et al., 2019). These technologies are reshaping accounting practices and present opportunities for AIS to contribute significantly to the evolution of accounting methodologies and practices. However, their integration into mainstream accounting research remains limited, indicating a gap that needs to be addressed.

The Role of Digitalization: Digitalization is a driving force behind the need for closer integration between AIS and accounting. As digital tools and systems become increasingly integral to accounting processes, the relevance of AIS research to the broader accounting field grows (Jans et al., 2023). This underscores the importance of fostering collaboration and cross-disciplinary research to fully leverage the benefits of digitalization in accounting.

Potential for Interdisciplinary Collaboration: The findings suggest that there is significant potential for interdisciplinary collaboration between AIS and other areas of accounting, such as management accounting and auditing. Such collaboration could enhance

the development of innovative solutions to complex accounting challenges and promote a more integrated research agenda (Granlund, 2011).

Need for a Unified Research Agenda: The review identifies a need for a unified research agenda that bridges AIS and mainstream accounting research. This agenda should encourage the exploration of cross-cutting themes and the adoption of diverse methodologies to address the multifaceted challenges facing the accounting profession in the digital age (Murthy, 2016).

While there has been progress in integrating AIS into mainstream accounting research, significant challenges remain. Addressing these challenges requires a concerted effort to broaden the scope of AIS topics covered in accounting journals, embrace methodological diversity, and foster interdisciplinary collaboration. By doing so, the accounting profession can harness the full potential of AIS research to drive innovation and improve accounting practices.

5. Discussion

The integration of Accounting Information Systems (AIS) into mainstream accounting research is a complex and multifaceted issue that has been the subject of considerable academic inquiry. This discussion synthesizes the findings from the qualitative literature review and compares them with eight prior studies to provide a comprehensive understanding of the current state and future directions for AIS integration into accounting research.

One of the key findings of this review is the limited representation of AIS topics in mainstream accounting journals. This observation aligns with the study by Baldwin, Morris, and Scheiner (2000), which found that AIS researchers often publish in specialized AIS journals rather than mainstream accounting outlets. This trend suggests a potential disconnect between AIS research and broader accounting scholarship, which could limit the impact and visibility of AIS research within the accounting community.

The review also highlights a divergence in research methodologies between AIS and mainstream accounting studies. While accounting research often favors archival and empirical methods, AIS research employs a broader range of methodologies, including design science and case studies (Murthy, 2016). This methodological diversity is echoed in the work of Coyne et al. (2010), who noted that AIS research often involves innovative methodologies that are less common in traditional accounting research. This divergence can be both a strength and a barrier, as it may hinder the integration of findings across the two fields.

Emerging technologies such as blockchain and data analytics are gaining prominence in AIS research (Dai & Vasarhelyi, 2017; Kogan et al., 2019). These technologies offer new opportunities for AIS to contribute significantly to the evolution of accounting practices. Chiu et al. (2019) conducted a bibliometric analysis that revealed a growing body of AIS research focused on emerging technologies, highlighting the potential for AIS to drive innovation in accounting. However, the integration of these technologies into mainstream accounting research remains limited, indicating a gap that needs to be addressed.

Digitalization is a driving force behind the need for closer integration between AIS and accounting. As digital tools and systems become increasingly integral to accounting processes, the relevance of AIS research to the broader accounting field grows (Jans et al., 2023). This finding is consistent with the work of Granlund (2011), who emphasized the importance of extending AIS research to address management accounting and control issues in the context of digitalization. The integration of digital technologies into accounting practices presents both challenges and opportunities for AIS research to enhance its impact and relevance.

The findings suggest significant potential for interdisciplinary collaboration between AIS and other areas of accounting, such as management accounting and auditing. This potential is supported by the study of Dechow and Mouritsen (2005), which highlighted the importance of integrating enterprise resource planning systems with management control to achieve organizational integration. Collaborative efforts could enhance the development of innovative solutions to complex accounting challenges and promote a more integrated research agenda.

There is a clear need for a unified research agenda that bridges AIS and mainstream accounting research. This agenda should encourage the exploration of cross-cutting themes and the adoption of diverse methodologies to address the multifaceted challenges facing the accounting profession in the digital age (Murthy, 2016). The work of Sutton (2010) supports this finding, advocating for a research discipline without boundaries that embraces the diversity of AIS and accounting research.

The findings of this review are consistent with several prior studies that have explored the integration of AIS into accounting research. For instance, Ferguson and Seow (2011) identified past and future trends in AIS research, emphasizing the need for greater integration with mainstream accounting. Similarly, Vessey et al. (2002) conducted an empirical study of diversity in information systems research, highlighting the potential for interdisciplinary collaboration to enhance the impact of AIS research.

In contrast, some studies have noted challenges in achieving integration. For example, Poston and Grabski (2000) questioned whether AIS research is becoming another "QWERTY," suggesting that entrenched practices and resistance to change may hinder integration efforts. This perspective is echoed by Moser (2012), who raised concerns about stagnation in accounting research and the need for innovation to drive progress.

To address the challenges of integrating AIS into mainstream accounting research, several actionable suggestions can be made. Encouraging interdisciplinary collaboration, promoting the inclusion of diverse research methodologies, and fostering a culture of mutual respect and understanding between researchers in both fields are critical steps (Jans et al., 2023). Additionally, developing a unified research agenda that bridges AIS and accounting research can help address the complex challenges of the digital age and drive innovation in accounting practices.

Furthermore, there is a need for greater awareness and recognition of the value of AIS research within the accounting community. By highlighting the contributions of AIS to addressing emerging challenges and opportunities, researchers can promote a more integrated and impactful research agenda.

The integration of AIS into mainstream accounting research is essential for ensuring the continued relevance and quality of research in both fields. While there has been progress in integrating AIS into accounting research, significant challenges remain. Addressing these challenges requires a concerted effort to broaden the scope of AIS topics covered in accounting journals, embrace methodological diversity, and foster interdisciplinary collaboration. By doing so, the accounting profession can harness the full potential of AIS research to drive innovation and improve accounting practices.

6. Conclusions

The qualitative literature review on the integration of Accounting Information Systems (AIS) into mainstream accounting research underscores the critical need for a more cohesive and collaborative approach between these two fields. The review highlights the limited representation of AIS topics in mainstream accounting journals and the divergence in research methodologies as significant barriers to integration. Despite these challenges, the growing importance of digitalization and emerging technologies presents a unique opportunity for AIS to contribute significantly to the evolution of accounting practices.

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