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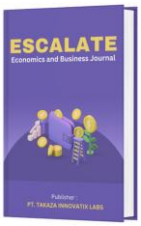

Accountants vs. AI: Collaboration or Competition?

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Abstract:*Background: The development of Artificial Intelligence (AI) in the Industrial Revolution 4.0 and Society 5.0 is transforming the accounting profession through the automation of routine tasks via Robotic Process Automation, sparking debates on whether AI replaces or collaborates with accountants. Objective: To analyze the role of AI in Accounting Information Systems (AIS) as a competitor or partner through a systematic literature review. Type and method: Systematic Literature Review (SLR) based on PRISMA 2020. Population: Scientific articles from Scopus, SINTA, and Google Scholar (2021-2026); sample: 18 purposive articles (41 initial → 18 final). Instrument: Keyword search protocol (AI accounting, human-AI collaboration); analysis: Interactive thematic (reduction, display, verification). Results: 67% of studies support collaboration (AI data handling, strategic accounting) with 60-80% efficiency, 33% indicate competition in administrative tasks. Conclusion: A human-AI hybrid model via the "AI Collaboration" framework is optimal; suggestions for AI curriculum and digital ethics training.*

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Introduction

Major transformations in accounting practices have emerged from technological disruptions during Industry 4.0 and Society 5.0. Innovations like Artificial Intelligence (AI) and the Internet of Things (IoT) now gather vast datasets, automating financial workflows. Robotic Process Automation (RPA), for instance, slashes manual errors by up to 70%, while ChatGPT powers predictive analytics at global accounting firms (Rosmiati, 2024; Septiyanti et al., 2025). A 2024 KPMG survey reveals that 72% of companies already integrate AI into financial reporting, and Gartner forecasts 99% adoption within three years. Leading firms such as Deloitte and PwC employ RPA for real-time audits (Abdullah

et al., 2025; Patricia & Putri, 2025).

Existing research on AI in accounting yields mixed findings. Some studies warn of job displacement as machines supplant routine tasks (Cosăcescu, 2023; Abdo-Salloum & Chehade, 2026), whereas others highlight efficiency gains through human-AI synergy (Bahar, 2025; Faridani & Aliah, 2025). Yet, no systematic literature review comprehensively maps this tension—particularly in accredited national journals—hindering a full grasp of competition versus collaboration dynamics.

This study seeks to identify, categorize, and synthesize AI's primary roles in Accounting Information Systems (AIS) from recent scholarship, determining if AI poses a threat or serves as a partner. Its novelty lies in proposing a new "Collaboration" framework for AIS, synthesized from prior works, which offers practical guidance for reshaping accounting roles in the digital era (Hermina et al., 2026; Ambarita et al., 2026).

Literature review

Disruptive Innovation Theory

Clayton Christensen's Disruptive Innovation Theory (1997) posits that emerging technologies like AI penetrate markets by addressing overlooked segments or low-end tasks ignored by incumbents, eventually upending their dominance.

In accounting, AI began by automating routine administrative functions such as data entry, potentially reshaping traditional accountants' roles if skills remain outdated—as evidenced in studies on RPA replacing manual processes (Yusuf et al., 2023; Patricia & Putri, 2025).

Yusuf et al. (2023) demonstrate that AI boosts efficiency by automating repetitive tasks, slashing transaction recording time by up to 50%. Yet, this efficiency introduces competitive threats, including job reductions for entry-level accounting staff.

Patricia and Putri (2025) similarly show AI enhancing Accounting Information Systems (AIS) through error reductions of up to 70%, though it widens skills gaps that may disrupt conventional accounting practices.

Task-Technology Fit (TTF)

The Task-Technology Fit (TTF) framework, proposed by Goodhue and Thompson (1995), holds that technology effectively supports work when its features align well with task requirements. In accounting, artificial intelligence such as Machine Learning (ML) fits tasks demanding high data volumes like analysis, whereas humans excel at ethical assessments. This human-machine pairing boosts overall output without fully supplanting human roles, as detailed in studies on human-machine synergy (Bahar, 2025)(Kokina et al., 2025). StudyBahar (2025) revealed that artificial intelligence optimizes efficiency in routine activities such as internal audits by up to 60%. However, this requires accountants to develop new skills to collaborate with AI, shifting the role of accountants to that of strategic advisors. On the other hand, Kokina et al. (2025) found that simple AI applications like Robotic Process Automation (RPA) can reduce administrative time by up to 80%, but there are major challenges such as opacity and bias. Therefore, the TTF emphasizes the importance of maintaining a balance between technology and human work to avoid over-reliance on technology.

Resource-Based View (RBV)

According to the Resource-Based View (RBV) framework, proposed by Jay Barney (1991), AI and accounting serve as unique strategic resources that competitors struggle to imitate. Their integration fosters sustained competitive edges through precise predictions and strong contextual insight.

In accounting, RBV endorses AI adoption to streamline data management, with accountants contributing irreplaceable tacit knowledge, as outlined in studies on professional evolution (Abdullah et al.,2025)(Ambarita et al., 2026).

Research findings (Abdullah et al.,2025) explained that incorporating artificial intelligence into accounting can improve the quality of data analysis by up to 75%. However, the role of accountants remains crucial in assessing ethical aspects and in creating competitive advantage by leveraging a combination of technology and human resources.

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Meanwhile, Ambarita et al. (2026) found that the role of accountants is shifting from manual work to a more strategic one. This digital skill enhancement has increased organizational competitiveness by up to 60%, further reinforcing the RBV's role as an appropriate framework for combining AI as an intangible asset with human expertise.

Accounting Information System (AIS)

Accounting Information System (AIS) is a technology-based framework that integrates the collection, processing, and reporting of financial data to support strategic decision-making. Over time, AIS has evolved from manual, paper-based systems into cloud-based platforms and AI-powered environments that allow real-time analysis and predictive insights, as discussed in the literature on the digital transformation of accounting (Patricia & Putri, 2025; Hermina et al., 2026).

***Artificial Intelligence* (AI)**

Artificial Intelligence (AI) in accounting is defined as technology that simulates human intelligence to automate complex tasks, such as detecting financial anomalies and predicting risks, where AI enhances efficiency while still relying on human judgment and oversight (Bahar, 2025; Yusuf et al., 2023).

Table 1. Previous Research

Writer	Findings
Ambarita et al. (2026), Abdo-Salloum et al. (2026), Bahar (2025), Septiyanti et al. (2025), Abdullah et al. (2025), Patricia & Putri (2025), Opoku et al. (2025), Safarah et al. (2025), Faridani & Aliah (2025), Rosmiati (2024), Rahmawati & Subardjo (2023), Yusuf et al. (2023), Hasan (2022)	(+)
Hermina et al. (2026), Perwiro et al. (2025), Elan Kurniawan, SIA-AI, Lutfi Andi A. & Ainun Arizah (193–201, n.d.), Kokina et al. (2025), serta Cosăcescu (2023).	(-)

(+) positive effect, (-) negative effect

Research methods

This study uses a Systematic Literature Review (SLR) as a qualitative synthetic research method to integrate findings from studies related to the impact of AI on the accounting profession, following the PRISMA 2020 guidelines that emphasize transparency and reproducibility in the selection and synthesis of literature. (Sugiyono, 2021) The SLR approach was chosen because it is descriptive-interpretive, allowing for an in-depth exploration of the competition versus collaboration debate between AI and accounting through thematic analysis of peer-reviewed articles, as recommended for systematic literature reviews in education and management. (Creswell & Poth, 2021)(Sudaryono, 2023) The main instrument is the SLR search protocol that includes keywords such as "artificial intelligence accounting", "AI accounting profession", and "human-AI collaboration accounting" in the Scopus, Google Scholar, and SINTA databases, equipped with inclusion criteria (articles 2021-2026, peer-reviewed, English/Indonesian, accounting focus) and exclusion criteria (proceedings, non-full text). [Emzir, 2022] The data analysis technique adopted the interactive thematic model of Miles et al. adapted for SLR, including data reduction (screening duplicates/irrelevances), thematic display (table of competition/collaboration themes), and verification through source triangulation and implicit member-checking via article quality (Sugiyono, 2021)(Emzir, 2022).

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The study population consisted of all scientific articles indexed in Scopus (Q1-Q2: 2 articles), SINTA 2-5 (total 11), and Google Scholar (5 articles) relevant to the topic of AI in AIS from 2021-2026, with an estimated potential of thousands of articles. (Sudaryono, 2023) A purposive sample of 18 articles was selected after PRISMA screening: 41 initial identification, 32 after de-duplicate, 22 after full-text, and a final 18 high-quality articles based on relevance, strong methodology, and impact (e.g., Ambarita et al., 2026; Bahar, 2025). (Creswell & Poth, 2021)

The research procedure follows an input-process-output cycle: preparation (PRISMA protocol formulation, keyword validation), implementation (2-month search from October to November 2025, phased screening), and output (thematic analysis, SIA collaboration conceptual framework).Validity is maintained through datab ase triangulation, persistence in review, and PRISMA diagram audit trail for transferability and confirmability, ensuring credible findings such as the dominance of collaboration themes from 12/18 studies. (Emzir, 2022)(Creswell & Poth, 2021)

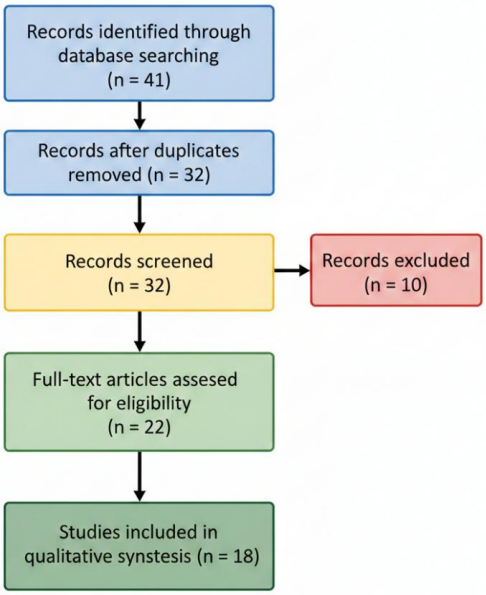

Figure 1. PRISMA Flowchart

Results and Discussion

Competition Aspect (Disruptive Innovation Perspective)

Studies have shown that artificial intelligence (AI) is increasingly taking over administrative tasks such as data entry, generating simple financial reports, and reconciling bank accounts. This indicates that the technology is reshaping the role of traditional accounting workers by automating routine, repetitive processes that are prone to human error. AI brings greater efficiency and lower operational costs, as demonstrated in research on Robotic Process Automation (RPA), which reduces dependence on manual work (Yusuf et al., 2023)(Patricia & Putri, 2025)(Rahmawati & Subardjo, 2023).

Analysis of studies that support the view that AI is disrupting the role of traditional accountants includes work by Cosăcescu, L. (2023), which examines competition, conflict, or cooperation, with a particular focus on the risks of routine tasks being replaced by chatbots and algorithms. In addition, Abdo-Salloum, A. M., & Chehade, S. (2026) also highlight the challenges posed by automation in shifting the role of accountants. Meanwhile, Rosmiati, D. (2024) and Ambarita et al. (2026) confirm this trend through a systematic literature review showing a move from manual work to technology-driven processes, which can disadvantage accountants who fail to adapt, leading to a reduction of up to 40% in administrative tasks (Abdullah et al., 2025)(Hasan, 2022).

Collaboration Aspect (Task - Technology Fit Perspective)

Research on augmented intelligence shows that AI functions as a complement to human intelligence rather than a full replacement. This technology strengthens the ability to analyze large volumes of data, while accountants contribute business context and ethical judgment. The resulting

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collaboration can improve the accuracy of audits and decision-making by up to 60%, as described in studies on the integration of AI with the strategic role of accountants (Bahar, 2025; Faridani & Aliah, 2025; Kokina et al., 2025).

Emerging roles for accountants identified in the literature include data advisors who combine AI expertise with business strategy, forensic auditors who use AI to conduct deeper investigations, and professionals responsible for the ethical management of algorithms to ensure transparency and fairness (Hermina et al., 2026; Perwiro et al., 2025; Safarah & Tengah, 2025). There is also a comparative summary of traditional accounting tasks—such as manual recording and data matching, which are being replaced by AI with efficiency gains reaching 80%—and new AI-era tasks like predictive analysis and ethical consultation, which are enhanced through collaboration between humans and AI. This hybrid-model approach is emphasized in research aimed at achieving the highest productivity levels in accounting (Abdullah et al., 2025; Ambarita et al., 2026; Opoku et al., 2025).

Future Skills

Discussions in the literature on future skills highlight the importance of accountants' ability to understand big data in order to interpret financial patterns generated by AI. They also stress the need for critical thinking skills to assess bias in algorithms and verify the accuracy of outputs, as well as strong communication skills to convey complex AI-driven information to various stakeholders. These competencies are regarded as essential for effective collaboration between accountants and AI systems. Some authors further argue that continuous training and professional development can increase readiness for the AI-enabled environment by up to 70% (Septiyanti et al., 2025; Bahar, 2025; Faridani & Aliah, 2025; Rosmiati, 2024).

Conclusion

The main findings of a systematic literature review of 18 articles from 2021-2026 indicate that Artificial Intelligence does not completely replace accountants, but rather encourages synergistic collaboration in Accounting Information Systems. Twelve studies, or 67 percent, emphasize the collaboration perspective through Task-Technology Fit and Resource-Based View, where AI automates routine tasks such as data entry and reconciliation with up to 80 percent efficiency through Robotic Process Automation, while accountants shift to strategic roles such as predictive analytics, forensic audits, and algorithm ethics management. Disruptive competition is dominant in only six studies, or 33 percent, primarily for low-skilled administrative jobs, with time reductions of up to 50 to 70 percent but the risk of unemployment for those who are not adaptive. The proposed "AIS Collaboration" conceptual framework integrates Disruptive Innovation, TTF, and RBV theories for a human-AI hybrid model that improves decision accuracy by 60 to 75 percent.

However, limitations of the study include a focus on literature from 2021–2026 from Scopus, SINTA, and Google Scholar, which may have missed non-peer-reviewed or non-English and Indonesian studies. Furthermore, it relied on qualitative thematic analysis without quantitative metrics such as meta-analysis. Practical implications include recommendations for accounting universities to integrate AI, data analytics, and digital ethics curricula to prepare graduates as strategic advisors; firms like Deloitte are advised to adopt continuous training to increase future skills competency by up to 70 percent. Suggestions for further research include longitudinal empirical studies in Indonesia using mixed methods, multinational comparisons, or a focus on AI bias and ethical regulation to validate the collaboration framework more broadly.

Bibliography

Abdo-Salloum, A. M., & Chehade, S. (2026). The role of artificial intelligence in transforming accounting and auditing practices: A systematic review. *SAGE Open*, *16*(1), 1–13. https://doi.org/10.1177/21582440251403296

Abdullah, A. R., Indra, W., Mooduto, S., Hartoyo, A., Umi, T., Hulopi, K., Bina, U., & Gorontalo, M. (2025). Akuntansi dan artificial intelligence: Tinjauan literatur yang komprehensif. *Journal of*

Innovative and Creativity, *5*(2).
Ambarita, D. C., Manullang, E. J. R., Trinadia, W., & Darma, J. (2025). Perubahan peran akuntan di era artificial intelligence: Kajian literatur sistematis. *Jurnal Pendidikan Akuntansi dan Keuangan*, *12*(2), 112–128.
Bahar, A. (2025). Dampak kecerdasan buatan pada profesi akuntan. *Indo-Fintech Intellectuals: Journal of Economics and Business*, *5*(4), 7239–7248. https://doi.org/10.54373/ifijeb.v5i4.4392
Christensen, C. M. (1997). *The innovator's dilemma: When new technologies cause great firms to fail*. Harvard Business School Press.
Cosăcescu, L. (2023). The certified accountant and artificial intelligence – Competition, antagonism or partnership? *CECCAR Business Review*, *4*(10), 1–9. https://doi.org/10.37945/cbr.2023.10.01
Creswell, J. W., & Poth, C. N. (2021). *Qualitative inquiry and research design: Choosing among five approaches* (5th ed.). SAGE Publications.
Emzir. (2022). *Metode penelitian kualitatif: Analisis data kualitatif*. Rajawali Pers.
Faridani, M. R., & Aliah, N. (2025). Transforming accounting through artificial intelligence: A systematic literature review of opportunities, challenges, and ethical imperatives. *Proceedings of 2nd International Conference on Islamic Community Studies (ICICS)*, 677–696.
Goodhue, D. L., & Thompson, R. L. (1995). Task-technology fit and individual performance. *MIS Quarterly*, *19*(2), 213–236. https://doi.org/10.2307/249689
Hasan, A. R. (2022). Artificial intelligence (AI) in accounting & auditing: A literature review. *Open Journal of Business and Management*, *10*(1), 440–465. https://doi.org/10.4236/ojbm.2022.101026
Hermina, S. C., Kesuma, S. A., Nasution, F. N., & Erwin, K. (2026). A systematic literature review on ethics and artificial intelligence in the world of business and accounting (2024-2025). *Akua: Jurnal Akuntansi dan Keuangan*, *5*(1), 192–197. https://doi.org/10.54259/akua.v5i1.6006
Kokina, J., Blanchette, S., Davenport, T. H., & Pachamanova, D. (2025). Challenges and opportunities for artificial intelligence in auditing: Evidence from the field. *International Journal of Accounting Information Systems*, *56*, Article 100734. https://doi.org/10.1016/j.accinf.2025.100734
Opoku, P., Konadu Owusu, K., Gomashie, F., & Salifu, A. (2025). Embracing the future: How artificial intelligence is shaping the work of accountants at the University of Professional Studies, Accra. *International Journal of Research and Innovation in Applied Science*, *10*(3), 389–405. https://doi.org/10.51584/IJRIAS.2025.10030030
Page, M. J., McKenzie, J. E., Bossuyt, P. M., Boutron, I., Hoffmann, T. C., Mulrow, C. D., Shamseer, L., Tetzlaff, J. M., Akl, E. A., Brennan, S. E., Chou, R., Glanville, J., Grimshaw, J. M., Hróbjartsson, A., Lalu, M. M., Li, T., Loder, E. W., Mayo-Wilson, E., McDonald, S., . . . Moher, D. (2021). The PRISMA 2020 statement: An updated guideline for reporting systematic reviews. *BMJ*, *372*, n71. https://doi.org/10.1136/bmj.n71
Patricia, C., & Putri, A. M. (2025). Pengaruh artificial intelligence terhadap sistem informasi akuntansi. *Jurnal Ekonomika dan Bisnis (JEBS)*, *5*(1), 359–364. https://doi.org/10.47233/jebs.v5i1.2648
Perwiro, E. O., Kaltsum, I. M., Wijaya, M. K., Bagus Arshanjaya Bhuana, & Ramadhan, Y. (2025). Etika profesi akuntan dalam menghadapi disrupsi teknologi dan artificial intelligence (AI). *RIGGS: Journal of Artificial Intelligence and Digital Business*, *4*(4), 3268–3277. https://doi.org/10.31004/riggs.v4i4.4148
Rahmawati, M. I., & Subardjo, A. (2023). Teknologi artificial intelligence dan blockchain: Sebuah keniscayaan pada akuntan dan auditor. *Jurnal Ilmiah Akuntansi dan Keuangan (JIAKU)*, *2*(4), 403–409. https://doi.org/10.24034/jiaku.v2i4.6355
Rosmiati, D. (2024). Dampak artificial intelligence terhadap bidang audit dan profesi auditor: Systematic literature review. *Akuntoteknologi: Jurnal Ilmiah Akuntansi dan Teknologi*, *16*(2), 1–12. https://doi.org/10.31253/aktek.v16i2.3453
Safarah, N., Aji, G., Negeri Abdurrahman Wahid Pekalongan Jl Pahlawan Km, I. K., Pekalongan, K., & Tengah, J. (2025). The role of artificial intelligence in modern accounting: A systematic literature review. *Finance, and Accounting Research*, *1*(1), 48–65.
Septiyanti, R. D., Wany, E., & Prayitno, B. (2025). Peran akuntan, integrasi inovasi artificial intelligence

(AI) dan internet of things (IoT) dalam menghadapi digitalisasi ekonomi menjelang era society 5.0. *Jurnal Ekonomi dan Bisnis*, *6*(1), 11.

Sugiyono. (2021). *Metode penelitian kuantitatif, kualitatif, R&D*. Alfabeta.

Sudaryono. (2023). *Metode penelitian pendidikan*. Pustaka Pelajar.

Yusuf, M. F. M., Garusu, I. A., & Rauf, D. M. (2023). Integrasi teknologi artificial intelligence dalam sistem akuntansi modern. *Journal of Trends Economics and Accounting Research*, *4*(1), 230–234. https://doi.org/10.47065/jtear.v4i1.902