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Strategic Audit Redesign in the GenAI and Agentic AI Era: Safeguarding Talent and Elevating Professional Judgment

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1. Introduction

Artificial intelligence continues to reshape work across sectors, and the accounting profession is already experiencing profound effects. Large organizations are investing heavily in AI infrastructure, signaling a shift in how work is being structured. Walmart's CEO, Doug McMillon, emphasized that "AI is going to change literally every job," reflecting the company's plans to retrain more than two million employees as AI-assisted workflows become integrated across the enterprise (Nassauer & Cutter, 2025, para. 3). Amazon is undergoing a similar transformation: with more than $100 billion invested in AI and data center capabilities, the company is increasingly using AI to support tax analysis, fraud detection, reconciliations, and other finance functions (Maurer, 2025). Major employers like JPMorgan Chase and Amazon have begun openly discussing job reductions tied to AI adoption (Nassauer & Cutter, 2025). These examples underscore a broader trend in which AI is not merely a tool but a catalyst for rethinking job design.

A Gartner report notes, "The recent layoffs at major firms are not evidence of a simple automation-driven job apocalypse but are instead the first tremors of a profound strategic reallocation of human capital specific to a small subset of companies that have significant opportunities in net-new AI-centric revenue streams" (Gartner, 2025, p. 4). Firms are reallocating headcount toward roles aligned with AI-enabled workflows. Research shows that large adopters of

foundation models have experienced notable declines in routine, task-based roles, historically central to early-career audit work (Brynjolfsson et al., 2025).

For auditors, the implications are significant. Much of the routine work traditionally done by human auditors is increasingly being supported or augmented by advanced AI systems. Yet rather than eliminate roles, firms can redesign them. Generative AI (GenAI) and agentic AI can extend auditors' judgment and enable new focus areas, from ESG assurance to fraud analytics and AI governance.

These developments present an important question for the profession: how can audit firms harness AI to enhance audit quality without weakening the pathways through which early-career auditors acquire essential skills? This paper examines the intersection of AI-driven audit transformation, talent development, and professional judgment, offering a framework for strategically redesigning audit work in the GenAI and agentic AI era. Drawing on emerging empirical research, industry analyses, and practitioner evidence, this article develops a conceptual framework for human–AI collaboration and strategic audit redesign in an AI-enabled environment.

2. Trends in Audit Transformation

The early-career audit role is evolving as firms embed AI into core workflows. As firms invest in GenAI and agentic AI, the most immediate impact is not mass layoffs, but a steady erosion of entry-level tasks, the traditional starting point for talent development.

A broad U.S. labor-market study using ADP payroll records found that early-career workers ages 22–25 in the most AI-exposed occupations experienced a 13% relative decline in employment, even after accounting for company-specific employment changes. The same study also found that workers ages 22–25 experienced a 6% decline in employment from late 2022 to July 2025 in the highest AI-exposure quintiles, while employment for older workers continued to grow (Brynjolfsson et al., 2025). Although the study is not audit-specific, its findings are relevant to audit because entry-level audit work has historically included routine, task-based activities that are increasingly susceptible to AI-enabled automation.

A Business Insider article reported PwC plans to reduce U.S. campus hiring by nearly one-third by 2028, citing “transformation efforts, the impact of AI, and further AC integration” (Thompson, 2025, para. 13). In the article, AC refers to PwC’s acceleration centers, described as offshoring hubs in lower-cost labor markets. These are not likely isolated moves but may reflect a broader rebalancing of labor demand across professional services.

Yet the story is more nuanced. Field evidence indicates that junior auditors piloting GenAI tools reported using them for client emails, audit documentation, and internal research, tasks traditionally seen as formative learning experiences (Choi & Xie, 2025). Rather than displacing these professionals, GenAI was observed to shift the nature of their contributions, with managers encouraging them to adapt and evaluate AI-generated content. These findings suggest that early-career roles are not vanishing, but being restructured to emphasize oversight, judgment, and human–AI collaboration.

At the same time, firms face growing pressure to modernize talent models. Industry research highlights a significant shift in the talent model for internal audit, emphasizing the need for skills that align with AI-enabled practices. Internal auditors are expected to become adept at using generative and agentic AI, not only by leveraging tools for tasks like risk assessment and documentation, but also by developing fluency in designing prompts and, over time, acquiring skills to configure or deploy AI agents (Protiviti, 2025). As AI transforms the function, traditional fixed job roles are giving way to more flexible skill sets that combine critical thinking with technological agility. The most valuable contributions will come from human auditors who bring judgment, relational insight, and adaptability to their work, traits that machines cannot replicate.

This convergence of hiring contraction, automation, and skill realignment presents a clear tension: If firms automate away the “first rung” of the audit career ladder, who will become tomorrow’s audit leaders? The challenge is not whether AI will be adopted; it already has been. The challenge is how firms can rethink staffing and upskilling to ensure their future talent pipeline remains intact.

3. Use Cases

GenAI and agentic AI are transforming assurance work into a more technology-enabled, insight-driven process. The following use cases reflect capabilities described in firm and industry publications and currently being deployed or developed across public accounting firms. These AI tools are reshaping audit workflows by streamlining routine procedures and shifting auditors' attention from repetitive tasks to higher-value work that necessitates auditor judgment.

3.1 Enhancing Risk Assessment and Anomaly Detection

Embedded within audit platforms, generative and agentic AI systems can analyze the complete set of in-scope transactions, detecting anomalies, flagging exceptions, and directing auditors toward areas requiring judgment. AI-driven transaction-scoring tools evaluate 100% of general ledger and subledger data, generating audit evidence and identifying outliers in real time (KPMG, 2024b). These tools provide a level of testing coverage no manual, sample-based approach could achieve. By continuously monitoring transactions, these systems can uncover emerging patterns that suggest potential areas with misstatements or control deficiencies early in the engagement. These capabilities allow auditors to focus on higher-risk areas earlier in the audit and drive higher audit quality through stronger testing by analyzing entire populations. Realizing this capability, however, depends on several prerequisites. The tools must be able to access and ingest complete transaction data, which generally requires integration with the client's ERP or accounting system, and data of sufficient quality to support population analysis. Firms must also apply appropriate model-governance safeguards, including a human-in-the-loop approach in which auditors review and validate flagged items rather than relying solely on machine output.

3.2 Journal Entry Testing (JET)

Journal entry testing, traditionally a year-end procedure, can now be front-loaded. The process typically starts with defining high-risk criteria and then identifying related journal entries. Instead, GenAI-powered tools identify high-risk entries and disclose the criteria derived from the underlying data set. This flipped approach supports the planning and risk assessment process early in the year by focusing on audit areas that have a higher associated risk (KPMG AG, 2024).

3.3 Controls and Information Testing

AI streamlines how auditors document their understanding of controls. Walkthroughs can now be recorded, transcribed, and analyzed in real time. For example, firms have deployed voice-to-text tools that allow audit teams to record and analyze discussions with management to understand a company's processes and risks. This is then paired with automated flowcharting that generates process maps directly from a recorded walkthrough meeting or transcript (KPMG, 2024a). To evaluate IT controls, firms have deployed GenAI-enabled tools that translate program code into plain language, helping auditors understand system logic and validate functionality. EY's EYQ Code Explainer, for instance, renders a system's program code in plain English to help auditors understand the functionality of automated controls, ask sharper questions, and validate that those controls operate as intended (EY, 2025).

AI also enables effective information testing. Tools such as DataSnipper, integrated within Microsoft Excel, efficiently reconcile samples in Excel against supporting documents (KPMG AG, 2024). The review process also benefits from time savings by directing the reviewer to the underlying source of information.

3.4 Automating Document Review

Specialized AI applications expedite document review and summarization through targeted functionalities. For example, contract analyzers extract and compare key terms and changes across reporting periods, a valuable tool for complex documents, such as revenue agreements. Gap-analysis tools validate audit documentation against professional standards to ensure that documentation is in line with auditing standards and firm methodology. From a reporting perspective, benchmarking tools align disclosures with those of peer companies (KPMG, 2024a). Automated tie-out capabilities may also accelerate review by validating calculations and highlighting inconsistencies, including within financial statement footnotes (KPMG, 2024a). Collectively, these tools enable auditors to focus on interpretation, risk evaluation, and professional judgment.

3.5 Redirecting Talent to Higher-Value Work

As AI handles labor-intensive tasks, auditors can devote more time to activities demanding professional judgment and skepticism. A KPMG global survey

reported that 64% of companies expect auditors to evaluate their use of AI in financial reporting and provide assurance over AI-related controls (KPMG International, 2024). The auditor's role is likely to expand to include oversight of how clients design, implement, and monitor AI systems.

3.6 Emerging Use Cases

The use cases described thus far reflect capabilities firms are deploying today, but the trajectory points toward far more autonomous, agent-driven assurance. EY has announced the development of specialized AI agents and the embedding of agentic AI across the audit at enterprise scale, signaling that much of the transformation still lies ahead. For example, EY announced a global rollout of enterprise-scale agentic AI in assurance, embedding a multi-agent framework into its EY Canvas platform across 160,000 audit engagements, with the system expected to support all end-to-end audit activities by 2028 (EY, 2026). These agents can recall context, communicate with one another, and coordinate analyses across the engagement. Interconnected agentic systems collaborate to evaluate anomalies, test control effectiveness, and flag exceptions for review. As these systems mature, the audit moves toward an adaptive, intelligence-driven environment, one that pairs the precision of machine analysis with the professional judgment only auditors can provide.

4. Strategic Imperatives for Audit Redesign in the GenAI Era

As AI transforms audit work, firms must intentionally redesign roles, workflows, and learning pathways to preserve career development and ensure audit quality. Entry-level auditors traditionally developed competencies through repetitive tasks that helped them internalize business processes and audit logic. With AI absorbing many of these tasks, firms must provide alternative mechanisms for experiential learning.

Redesigned roles increasingly center on validation, exception analysis, and interpretation. Junior auditors may spend more time evaluating AI-generated insights and engaging in client interactions that demand contextual reasoning. Managerial roles are similarly evolving: supervisors must help staff interpret AI outputs, understand model limitations, and integrate machine-assisted analyses

into broader audit strategies. These changes elevate the importance of coaching, communication, and structured oversight.

Professional judgment also evolves in this environment. Auditors must exercise skepticism not only toward client-provided information but also toward AI-generated analyses. This form of “digital skepticism” requires understanding the capabilities and limitations of AI models, recognizing potential hallucinations or biases, and determining whether AI insights are appropriate for use as evidence.

Data confidentiality must also become a core design consideration in AI-enabled audit workflows. Because audit work often involves sensitive client financial data, firms should limit the use of such information to approved, secure environments rather than open public AI tools. Appropriate safeguards may include sandboxed or enterprise-controlled models, data minimization, redaction of unnecessary identifiers, access controls, audit logs, retention limits, and clear restrictions on whether prompts or outputs can be used for model training. These controls help ensure that AI adoption enhances audit efficiency without compromising client confidentiality, professional obligations, or trust in the audit process.

Finally, governance and risk management frameworks must adapt to AI’s expanding role in financial reporting. As clients incorporate AI into automated workflows, auditors must understand how these systems operate, what risks they introduce, and how to evaluate governance structures that ensure reliability and fairness. Firms that invest in developing these competencies will be better positioned to navigate regulatory evolution and meet emerging stakeholder expectations.

5. Implications for Audit Quality and Professional Standards

AI’s ability to analyze large datasets and identify nuanced patterns has the potential to strengthen audit quality by improving anomaly detection, expanding coverage, and enhancing documentation. However, these benefits materialize only when auditors apply appropriate oversight.

Reliability is a key challenge. AI-generated outputs may reflect biases in training data or produce hallucinations that appear plausible but are unsupported by

evidence. Auditors must therefore evaluate AI analyses carefully, ensuring that evidence is both sufficient and appropriate. Explainability presents another challenge: auditors must be able to articulate how AI-assisted conclusions were reached, consistent with documentation requirements.

Automation bias also poses risks. Less experienced auditors may place undue confidence in AI results, especially when outputs appear polished or authoritative. Training programs must cultivate digital skepticism to mitigate this risk. Independence concerns may arise when clients use AI in their financial reporting processes, requiring auditors to examine how client-side systems operate and how AI-generated evidence is produced.

Professional standards remain clear that responsibility for the audit opinion rests with human auditors. Under PCAOB AS 1000, auditors must exercise due professional care, professional skepticism, and professional judgment, and must plan and perform the audit to obtain sufficient appropriate audit evidence that provides a reasonable basis for forming an opinion (Public Company Accounting Oversight Board [PCAOB], n.d.-a, paras. .09–.13). PCAOB AS 1105 further requires auditors to obtain audit evidence that is sufficient and appropriate, with appropriateness evaluated based on relevance and reliability (PCAOB, n.d.-b, paras. .03–.06). Although regulatory bodies may update guidance to clarify expectations for AI use, these foundational principles—professional skepticism, independence, evidence sufficiency, and auditor responsibility—continue to guide audit practice in an AI-enabled environment.

6. A Framework for Human–AI Collaboration in Audit

As GenAI and agentic AI become embedded in audit workflows, structured approaches to human–AI collaboration are necessary to maintain audit quality and accountability. The goal is not to decide whether AI replaces auditors, but to define how auditors should supervise, challenge, and contextualize AI-generated insights.

A practical framework for human–AI collaboration distinguishes among AI-suited tasks, human-judgment tasks, and hybrid tasks. Table 1 summarizes this distinction using examples from common AI-enabled audit use cases.

Table 1

Human–AI Collaboration Framework for Audit Work

Category	Role of AI and Auditor	Examples from Audit Practice
AI-suited tasks	AI performs structured, repetitive, or high-volume tasks, subject to auditor review and governance controls.	Full-population transaction scanning; anomaly and outlier detection; document summarization and comparison; automated tie-outs and disclosure benchmarking.
Human-judgment tasks	Auditors retain responsibility for contextual interpretation, skepticism, ethical reasoning, and final conclusions.	Determining whether anomalies indicate material misstatement risk; evaluating sufficiency and appropriateness of audit evidence; assessing control implications; forming and supporting the audit opinion.
Hybrid tasks	AI generates insights, drafts, or preliminary classifications, while auditors validate, refine, and document conclusions.	Journal entry testing in which AI identifies high-risk entries and auditors validate risk criteria; walkthrough transcription and flowcharting followed by auditor evaluation of control design; contract analysis in which AI extracts key terms and auditors assess accounting implications.

Hybrid tasks are becoming increasingly central to audit work because they combine machine-generated analysis with human evaluation. AI systems may surface unusual patterns, generate draft documentation, or extract relevant contract terms, but auditors must determine the significance of those findings and refine outputs to meet professional standards. This form of collaboration requires auditors to possess both technical fluency and critical evaluative skills.

Agentic AI introduces new oversight responsibilities, as these systems can initiate analytical tasks autonomously. Boundaries must be established to limit autonomous functions to analytical steps rather than judgment-oriented decisions. These boundaries should be supported by practical controls such as role-based

permissions, activity logging, human-in-the-loop approval gates, and rollback procedures when an AI-generated action or recommendation is inappropriate. Transparency is essential so that auditors can explain how AI outputs were generated, what data or prompts were used, and how the outputs were evaluated. Continuous monitoring ensures that AI behavior remains consistent with expectations and allows auditors to identify potential model drift.

These structures affirm a core principle: accountability for the audit rests with human auditors. AI can assist in evidence gathering and analysis, but cannot replace the auditor's responsibility to apply professional skepticism, evaluate multiple sources of evidence, and form an independent opinion.

7. Conclusion

The rise of GenAI and agentic AI represents a transformational moment for the audit profession. These technologies are reshaping workflows, elevating the cognitive and judgmental demands placed on auditors, and expanding the analytical reach of audit procedures. While public discourse often focuses on displacement, the evidence suggests a more complex transformation in which AI augments rather than replaces human expertise.

The future of audit depends on embracing AI thoughtfully and responsibly. Firms that integrate AI while preserving ethical foundations and strengthening professional judgment will be best positioned to enhance audit quality and uphold public trust. The challenge is not simply adopting new tools but reimagining the purpose and practice of auditing in a rapidly evolving technological landscape.

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Conflict of Interest

The authors declare no conflicts of interest related to this research.

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