Book Review: AI-Powered Education: Innovative Teaching Strategies to Elevate Student Learning

Magruder, K. J., Cavallo, A. M., & Clark, A. M. (Eds). (2025). *AI-Powered Education: Innovative Teaching Strategies to Elevate Student Learning*. Mavs Open Press Open Educational Resources. 50. https://mavmatrix.uta.edu/oer_mavsopenpress/50

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In the era of science and technology, every area, including education, has been dominated by technology. Technology comes with both pros and cons. However, if technology is used effectively, we can mitigate its drawbacks and reap numerous benefits from it. We find both supporting and opposing groups of Artificial Intelligence (AI). Nonetheless, the most important thing is the thin line between the ethical use and unethical use of AI tools in everyday life. *AI-Powered Education: Innovative Teaching Strategies to Elevate Student Learning* has been published at the right time. Most educators are often forced to face a state of confusion. As a solution, this book teaches instructors how AI Generative tools, such as ChatGPT and Microsoft Copilot, help them maximize learning outcomes in the classroom and beyond. The book has been collated and edited by three professors representing different departments at the University of Texas at Arlington. Karen J. Magruder enjoys incorporating fact-based practices into her teaching online. Similarly, Ann M.L. Cavallo teaches some branches of science. She teaches various subjects, including psychology, biology, physics, and earth science. Andrew M. Clark leads the Department of Communication. He has already carved a niche in mass media. Overall, this book basically is intended for teachers who aspire to improve students' learning and ChatGPT literacy through ethical use in higher education.

Realizing the potential drawbacks of Generative AI tools in academics, the book emphasizes the verification of information for accuracy and suitability. The authors assure that users do not need to be technology experts to use AI successfully to achieve course objectives and increase teachers' familiarity with technology. The authors encourage teachers and students to embrace the innovative aspects of technology to enhance learning outcomes through creativity and collaboration. They have shared very simple activities of using AI, especially ChatGPT, that can be adapted to suit the needs of individual classrooms, echoing Madden et al.'s (2025) assertion that AI-driven systems that cater to diverse learning needs" (p. 3) because AI has the potential to offer "considerable assistance in providing varied learning sources that were tailored to diverse learning needs and different types of learners" at different educational levels (Nguyen, 2023, p. 34).

While most contributors acknowledge that AI tools present challenges, they advocate for the ethical and informed integration of these tools rather than outright rejection. Tenen (2024), for example, argues that in today's digital world, we must "learn to become part software engineers and part…" (p. 2), suggesting a blend of human adaptability and technical awareness is essential. Sherma (2024) similarly envisions a positive collaboration between machine-generated support and human intelligence, particularly in educational settings. Rather than focusing on heavy theoretical frameworks, the book leans toward practical guidance, focusing on how AI can be responsibly applied across various academic disciplines.

CITATION | Rodriguez, A. (2025). Book Review: AI-Powered Education: Innovative Teaching Strategies to Elevate Student Learning by Magruder, K. J., Cavallo, A. M., & Clark, A. M. (Eds). (2025). *International Journal of TESOL & Education*, *5*(3), 182-186. DOI: https://doi.org/10.54855/ijte.255311

The book consists of 13 practical activities that demonstrate how teachers can integrate AI into various disciplinary contexts. It begins with a short history of AI, its opportunities, and its limitations, followed by an introduction to Generative AI for students in general. While one chapter illustrates how to conduct rubric-based assessments, another chapter offers some strategies for publishing academic papers on LinkedIn. *For example, teachers can first prepare assignment directions and grading criteria. After that, they can ask ChatGPT to create a rubric that* they can modify. It saves teachers' time. Business communication is addressed through guidance on drafting proposals and delivering presentations. Immersive learning experiences are explored through simulations and policy advocacy role-play. A media-focused activity involves staging a press conference, while another demonstrates how to enhance feedback and ensure constructive alignment in course design. *For example, ChatGPT can be used to simulate a breaking news press conference, where students role-play as journalists asking real-time questions to an AI acting as a public information officer during a fictional emergency. This activity helps students practice critical questioning, gather evolving information, and write timely news stories based on AI-generated responses*. Readers also learn to compare terms through experimental design, build inquiry-based curricula, and engage students in literary analysis and critical thinking using AI-generated clues and feedback.

A brief biography of the author follows each chapter. Every author is a Ph.D. Every author has shared noteworthy ideas. However, some ideas are worthier and more commendable. Jess Kahlow's notion of rubric generation to grade students' assignments more transparently and objectively is not only time-saving but also worth doing. She reveals, “Making good rubrics with specific and detailed criteria for each rating can be difficult and time-consuming. Enter—ChatGPT” (p. 20). For example, ChatGPT can create an essay rubric instantly that can be readjusted later.

Similarly, Christy Spivey's focus on AI-enhanced discussion in online classes exemplifies best practices in digital pedagogy, including the ethical use of GenAI and the development of digital literacy. Meanwhile, Karen Bravo's introductory activity on GenAI literacy for nursing students bridges technical knowledge with critical ethical reflection—an important emphasis throughout the volume. Her "assignment discusses the inherent ethical and other issues in using artificial intelligence and what the student must know to miss any pitfalls" (p. 15). She alerts her students to important ethical uses.

These opening chapters (chapters 1 and 2) create the theoretical and practical foundation for the book. Magruder frames AI historically and philosophically, offering a balanced view of its strengths and boundaries in education. Bravo narrows this focus specifically to Generative AI, helping students and teachers understand its mechanics and potential classroom applications. Together, these chapters aim to equip readers with necessary baseline knowledge before they explore applied strategies.

Chapters 3, 5, 6, 9, 10, 11, and 13 center on leveraging AI tools to support writing, communication, evaluation, and higher-order thinking. For example, Philip and Carr focus on real-world writing genres, such as LinkedIn articles and business proposals, helping students develop marketable skills. Clark adds a journalism-inspired activity that links AI to public communication tasks. Kahlow, Kellam, and Kallie demonstrate how AI can streamline assessment by creating rubrics, offering targeted feedback, and facilitating linguistic comparisons. Chapter 13 introduces a literary and philosophical dimension, utilizing AI not only for surface-level assignments but also for engaging students in more in-depth literary analysis and critical reasoning. This theme reflects how AI can serve both student output and instructor evaluation.

Chapters 7, 8 and 12 push AI beyond simple writing or grading assistance, focusing on its ability to create dynamic, participatory learning environments. Roye's immersive case studies and simulations encourage students to learn through complex scenarios modeled by AI. Magruder's policy advocacy role-play adds civic engagement and social learning components, while Cavallo emphasizes inquiry-based curriculum design, where students construct knowledge through structured questioning and exploration.

Fig. 1

A rubric generated by ChatGPT to evaluate a high school essay

High School Essay Rubric (Total: 20 points)

Criteria	**4 – Excellent**	**3 – Proficient**	**2 – Developing**	**1 – Needs Improvement**
1. Thesis & Purpose	Clear, strong thesis; purpose is focused and fully developed	Clear thesis and purpose; mostly focused throughout	Thesis present but weak; focus may shift	No clear thesis; lacks focus or clear purpose
2. Organization & Structure	Logical structure with clear introduction, body, and conclusion; smooth transitions	Good structure; some transitions may be weak	Some organizational issues; ideas may be disjointed	Poor structure; lacks clear intro/body/conclusion; hard to follow
3. Evidence & Support	Strong, relevant evidence or examples; supports all points convincingly	Adequate evidence; supports most points well	Limited or unclear support; some points not well developed	Little or no evidence; lacks support for claims
4. Style & Word Choice	Language is clear, engaging, and appropriate for audience and purpose	Language is mostly clear; some variety in word choice	Language is basic; limited variety or clarity	Word choice is confusing, inappropriate, or dull
5. Grammar & Mechanics	Virtually error-free; polished and professional	Few minor errors; does not distract	Several errors; may affect readability	Frequent errors that interfere with meaning

This theme emphasizes active learning, student agency, and real-world problem-solving, positioning AI as a facilitator for richer pedagogical experiences rather than just an administrative tool.

A key strength of the text is its balance between enthusiasm and caution. The opening chapter carefully outlines both the potential benefits and the limitations of AI in education, from its ability to personalize learning and streamline administrative tasks to concerns over misinformation, academic integrity, and the digital divide. *For example, the writers clearly note that AI tends to generate false information and racist language. They acknowledge such dangers from the outset.* This balanced framing encourages readers to adopt a nuanced, ethical approach to AI use, rather than a techno-utopian mindset.

The book's layout, which features instructor directions, student-facing materials, cross-disciplinary applications, and AI disclosures, enhances its practical utility. Educators can easily adapt and implement the activities without extensive reworking. Moreover, the emphasis on transparency—both in AI use and pedagogical intent—models responsible scholarship and teaching. Indeed, the book makes users' jobs easier. The language of the book is precise and easy to understand. This language skill must be admired.

However, one potential limitation is the book's focus on the University of Texas at Arlington context. While the strategies are adaptable, some readers outside of this institutional culture may need to modify assignments more extensively to align with different policies, technologies, or student populations. Additionally, while the book addresses AI ethics, a deeper engagement with emerging global frameworks and cross-cultural perspectives would further enrich the discourse.

Overall, AI-Powered Education is a forward-thinking, open-access resource that provides educators with tested, innovative, and ethically grounded tools for navigating the evolving landscape of AI in education. It is effective not only for its actionable content but also for its commitment to digital equity and scholarly transparency. Some writers have openly acknowledged that certain chapters were "written with assistance from AI (ChatGPT), which supported the ideation process for the activity" (p. 160). The most important thing is that the book does not attempt to coerce anyone into adopting AI. The book is aimed at those who feel that students cannot be deprived of using AI to motivate themselves for excellence. It is highly recommended for faculty, instructional designers, and teacher educators aiming to enhance student learning through responsible AI integration.

Note: The book review has been written with the partial use of free version of ChatGPT (3.5).

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