

## **Beyond the Shortcut: The Double-Edged Role of AI in Nurturing Creativity and Learning under Pakistan's Plagiarism Rules**

Zanib Arshad Mughal<sup>1</sup>

### **Abstract**

Artificial Intelligence (AI) is rapidly reshaping the way students learn and writers create. In Pakistan, the rise of AI-driven tools such as ChatGPT, Grammarly, and paraphrasing software presents both opportunities and challenges. On one hand, AI supports creativity, enhances writing fluency, and helps learners build confidence. On the other hand, it risks encouraging over-dependence, weakening originality, and clashing with plagiarism policies enforced by the Higher Education Commission (HEC).

This paper explores the double-edged role of AI in creative writing and academic learning. It reviews current debates on AI and creativity, analyzes the benefits and drawbacks for students, and examines plagiarism regulations in Pakistan. The study argues that AI should not be treated as a shortcut to success but as a partner in the learning journey. Responsible integration, awareness of plagiarism policies, and fostering human creativity alongside technology are recommended for balanced use.

**Keywords:** Artificial Intelligence, creative writing, student learning, plagiarism policy, Pakistan

---

<sup>1</sup> Government College University, Lahore, Pakistan

## Introduction

Language Technology has consistently transformed the way humans think, learn, and express themselves. From the invention of the printing press to the digital revolution of the internet, each technological leap has reshaped how knowledge is produced and shared. Today, Artificial Intelligence (AI) represents one of the most profound disruptions in this trajectory. Unlike earlier tools that only stored or transmitted human ideas, AI systems now actively participate in generating content—an ability that blurs the boundary between human authorship and machine assistance.

Large language models such as ChatGPT can produce essays, research drafts, and stories within seconds, while tools like Grammarly and Quillbot refine grammar, enhance vocabulary, and rephrase sentences. For many students in Pakistan, particularly those for whom English is a second language, these tools act as writing companions, helping them overcome barriers to fluency and boosting their confidence in academic and creative tasks.

At the same time, AI's role in education has raised pressing concerns. Questions of originality, authenticity, and ethics dominate current debates. Some educators worry that over-reliance on AI may lead to the erosion of critical thinking and the flattening of creativity. Others fear that students may unknowingly commit academic misconduct, since Pakistan's plagiarism policies—though strict—do not yet explicitly address AI-generated work. This uncertainty creates a dilemma for both teachers and learners: is AI a legitimate learning aid, or does it constitute a form of dishonesty?

This study takes up these questions by examining the dual role of AI in creative writing and academic learning within Pakistan. It investigates how AI supports and hinders students, while also evaluating the adequacy of existing plagiarism regulations. By doing so, the research aims to highlight both the opportunities AI creates and the challenges it poses, ultimately proposing strategies for its responsible use in higher education.

## Background of the Study

Artificial Intelligence has shifted from being a futuristic concept to an everyday reality. Tools such as ChatGPT, Grammarly, Jasper, and Quillbot have become widely accessible, offering users the ability to generate text, correct grammar, and refine writing style almost instantly. These platforms are particularly attractive to students who struggle with

fluency or confidence in writing, as they provide support that once required human tutors or significant practice.

The promises of AI are undeniable. For hesitant or struggling writers, it reduces the anxiety of the blank page by offering suggestions and starting points. For second-language learners, it acts as a constant guide, improving sentence structure and vocabulary. In creative writing, AI can help students experiment with form, tone, and style in ways they may not attempt independently. In academic settings, it accelerates the writing process, helps refine arguments, and assists with formatting.

Yet, these benefits are accompanied by significant challenges. AI-generated texts often lack depth, emotional resonance, and the personal touch that characterizes human expression. Over-dependence on AI risks weakening critical thinking skills, reducing originality, and discouraging students from developing their unique voices. Moreover, the speed and fluency of AI outputs can tempt learners to bypass the process of genuine intellectual engagement, treating the tool as a shortcut rather than a scaffold for growth.

In Pakistan, these concerns intersect with specific educational realities. The country's higher education system faces persistent challenges, including uneven access to technology, reliance on rote learning, and language barriers for students learning in English. AI could potentially bridge some of these gaps by democratizing access to linguistic support. However, it could also exacerbate inequalities, as students in urban, technologically advanced contexts may benefit disproportionately while those in rural or under-resourced areas remain excluded.

Equally important is the question of plagiarism. Pakistan's Higher Education Commission (HEC) enforces a strict plagiarism policy, but the framework was developed before the widespread use of AI. The absence of explicit guidelines leaves students and teachers uncertain about whether AI-generated content should be considered a legitimate learning aid or a form of misconduct. This ambiguity creates a pressing need to reassess academic policies and teaching practices in light of new technological realities.

Thus, the background of this study highlights both the promise and the peril of AI in academic and creative contexts. On the one hand, it offers unprecedented opportunities for learning and innovation. On the other, it raises ethical, pedagogical, and policy questions that cannot be ignored.

## **Problem Statement**

The growing use of AI in academic and creative writing creates a paradox in Pakistan. While AI empowers students by generating ideas, correcting

errors, and improving fluency, it also risks undermining originality and violating plagiarism rules. Classroom examples reveal the dilemma: students copy-paste AI outputs, submit AI-generated essays, or present AI poetry as personal work. Teachers struggle to evaluate authenticity, while students remain unsure whether AI counts as plagiarism.

The central problem is the absence of explicit guidelines. Without clarity, students risk penalties and teachers lack consistent criteria. This study therefore examines the benefits and drawbacks of AI in creative writing and learning within the framework of Pakistan's plagiarism policy.

### **Objectives of the Study**

1. To explore the benefits of AI in creative writing and learning.
2. To identify the drawbacks of AI, including over-dependence and reduced originality.
3. To examine Pakistan's plagiarism policies in relation to AI-generated work.
4. To propose responsible and ethical ways of integrating AI into academic and creative spaces.

### **Research Questions**

1. In what ways does AI support students' learning and creative writing processes in Pakistan?
2. What potential risks emerge when students rely heavily on AI?
3. How do existing plagiarism policies in Pakistan interpret—or fail to interpret—AI-generated work?
4. What strategies can ensure responsible AI use without undermining originality and integrity?

### **Significance of The Study**

The significance of this study lies in its attempt to understand Artificial Intelligence (AI) not as a simple technological convenience, but as a force reshaping creativity, learning, and ethics in higher education. In Pakistan, where academic systems already face challenges of linguistic barriers, uneven access to resources, and rigid plagiarism frameworks, the

introduction of AI complicates both opportunities and risks. This research is therefore important at theoretical, practical, and contextual levels.

### **Theoretical Significance**

From a theoretical standpoint, the study contributes to ongoing debates in creativity studies, education, and digital ethics. Scholars have long argued about the nature of creativity: is it a uniquely human gift, or can it be simulated by machines (Boden, 2004)? By examining AI's role in creative writing, this study adds to the growing discourse on computational creativity and its limitations. Similarly, in the field of education, theories of constructivism emphasize active learning, while critical pedagogy advocates for empowering learners to take control of their knowledge. This research evaluates whether AI functions as a "scaffolding tool" that encourages growth or a "substitute" that undermines autonomy. It also engages with posthumanist perspectives, which challenge the idea of human authorship by acknowledging machines as co-participants in meaning-making.

### ***Practical Significance***

For students, the study highlights the promise and danger of relying on AI. Many learners in Pakistan, especially those for whom English is a second language, struggle with writing tasks. AI can boost their confidence and provide valuable linguistic support. However, without guidance, students risk falling into dependency, plagiarism, or shallow learning. The research equips them with awareness of both benefits and boundaries.

For teachers, the study provides insights into how AI is already shaping student writing practices. Rather than approaching AI only with suspicion, educators can use the findings to design assignments that incorporate AI responsibly—encouraging transparency, reflection, and originality.

For policymakers, especially the Higher Education Commission (HEC) of Pakistan, the study underscores the urgent need to revisit plagiarism policies. Current guidelines do not explicitly address AI-generated content, leaving both students and teachers uncertain. By identifying this gap, the research contributes to policy development that acknowledges technological realities while safeguarding academic integrity.

### ***Contextual Significance for Pakistan***

In Pakistan, the stakes are particularly high. The country's educational system faces challenges of limited resources, uneven access to technology,

and a heavy reliance on rote learning. In such an environment, AI could either widen inequalities or help democratize education. Urban students with better internet access may harness AI effectively, while rural students risk being left further behind. At the same time, AI might bridge gaps for struggling learners, offering support where teachers cannot provide one-on-one guidance.

Moreover, Pakistan's strict plagiarism framework makes this conversation urgent. Students who use AI without acknowledgment might unintentionally breach rules, leading to penalties that affect their academic careers. Thus, this study serves not only as an academic exploration but also as a guide for navigating the ethical and practical dilemmas students and educators face on a daily basis.

## **Scope and Limitations of the Study**

### **Scope of The Study**

This research focuses on the role of Artificial Intelligence in creative writing and academic learning within Pakistan's higher education context. Specifically, it examines how AI tools—such as ChatGPT, Grammarly, Quillbot, and similar platforms—are being used by university students to generate, refine, or improve written work. The study explores both the benefits (idea generation, improved grammar, confidence building, and productivity) and the drawbacks (over-reliance, loss of originality, plagiarism concerns).

A central part of the scope is the interpretation of plagiarism policies in Pakistan, particularly those issued by the Higher Education Commission (HEC). These policies are reviewed to analyze whether they adequately address the challenges posed by AI-generated content. The focus remains on writing and learning practices, not on other areas of AI application such as programming, engineering, or medical sciences.

The study also situates itself within a broader theoretical landscape. By drawing on creativity theory, constructivist pedagogy, critical pedagogy, and posthumanist perspectives, it aims to offer a multi-layered understanding of how AI reshapes authorship, learning, and academic honesty.

Geographically, the study focuses on Pakistan but engages with global debates for comparison. This allows the research to highlight both universal concerns—such as the definition of originality in the age of machines—and local realities, such as uneven access to technology and rigid plagiarism enforcement.

### ***Limitations of the Study***

Despite its ambitions, this study has several limitations that must be acknowledged:

#### **1. Rapidly Changing Technology**

AI tools evolve at an unprecedented pace. What is relevant today may become outdated tomorrow as new models with more advanced features are released. This means the study's conclusions are context-specific and may require updating as AI develops further.

#### **2. Focus on Writing and Learning**

The research deliberately narrows its scope to writing and academic learning. While AI has transformative implications in areas like research analysis, coding, and data science, these are beyond the current study's boundaries.

#### **3. Sample Constraints**

If surveys and interviews are used, they will be limited to a small group of university students and teachers. Their experiences may not fully represent the diversity of Pakistan's education system, particularly in rural areas or institutions with limited access to AI.

#### **4. Policy Ambiguity**

Since Pakistan's plagiarism policies have not explicitly addressed AI use, interpretations in this study are partly speculative. Until official revisions are made, the research can only point to possible gaps rather than offer definitive policy guidelines.

#### **5. Dependence on Self-Reported Data**

Any survey or interview data on students' AI use depends on honesty and self-awareness. Some students may underreport their reliance on AI due to fear of judgment, while others may exaggerate its benefits.

#### **6. Ethical Considerations**

The study acknowledges that research on plagiarism and AI use can be sensitive. Students may hesitate to openly admit to practices that could be labeled misconduct, which may limit the depth of data collected.

### ***Summary***

In short, the scope of this research is ambitious enough to explore AI's impact on creative writing, learning, and plagiarism in Pakistan, yet

modest enough to remain focused and manageable. The limitations remind us that the findings are contextual, situated in a rapidly evolving digital landscape, and should be interpreted with awareness of both technological flux and institutional ambiguity.

## **Research Methodology Research Design**

This study adopts a mixed-methods design, combining both quantitative and qualitative approaches. The reason for this choice is simple: AI use in creative writing and learning is not only about numbers—how many students use it, how often, and for what purposes—but also about meanings, experiences, and ethical dilemmas that cannot be captured by statistics alone. By integrating surveys with interviews and document analysis, the study ensures both breadth (a wider understanding of trends) and depth (a nuanced interpretation of experiences).

### ***Population and Sample***

The population of this study consists of undergraduate students and university teachers in Pakistan. Since AI use is most visible in higher education—where students engage in essay writing, research reports, and creative writing assignments—the study focuses on this group.

- **Sample of Students:** Approximately 150 undergraduate students from departments of English, Education, and Computer Science. These disciplines were chosen because they involve frequent writing tasks and are more likely to have exposure to AI tools.
- **Sample of Teachers:** Around 20 faculty members from the same disciplines, to capture educators' perspectives on AI's benefits and drawbacks.
- **Sampling Technique:** A purposive sampling method is applied, selecting participants who are most likely to provide relevant insights on AI use.

### ***Research Instruments***

1. **Questionnaire (Quantitative Tool)**
  - A structured questionnaire will be distributed to students, covering areas such as:
    - Frequency of AI use (daily, weekly, occasionally, never).
    - Types of tasks for which AI is used (grammar correction, idea generation, paraphrasing, essay writing).



- Perceived benefits (confidence, productivity, creativity).
- Perceived risks (plagiarism, overdependence, reduced originality).
- Awareness of plagiarism policies.
- Responses will be measured using a Likert scale (Strongly Agree → Strongly Disagree) for consistency.
- 2. Semi-Structured Interviews (Qualitative Tool)
  - Interviews will be conducted with both teachers and a subset of students.
  - Key themes include:
    - Personal experiences of using AI in academic or creative work.
    - Perceptions of AI as a tool versus a shortcut.
    - Concerns about plagiarism and authenticity.
    - Suggestions for integrating AI responsibly in classrooms.
  - Semi-structured design allows flexibility—participants can express views beyond prepared questions.
- 3. Document Analysis
  - The Higher Education Commission's (HEC) Plagiarism Policy (2020) will be critically reviewed.
  - Comparisons will also be made with international guidelines (e.g., policies from universities in the UK, US, and Australia).
  - This triangulation ensures that findings are grounded not only in perception but also in actual policy frameworks.

#### ***Data Collection Procedure***

- Questionnaires will be distributed electronically (Google Forms) and in printed format where digital access is limited.
- Interviews will be conducted face-to-face or via Zoom/Google Meet, depending on participant convenience.
- Policy documents will be accessed from official HEC publications and institutional websites.

#### ***Data Analysis***

1. Quantitative Analysis
  - Survey responses will be coded and analyzed using descriptive statistics (percentages, means, frequency distributions).
  - Results will be presented through tables, bar charts, and pie charts to highlight patterns in AI use and perceptions.

## 2. Qualitative Analysis

- Interviews will be transcribed and coded thematically.
- Themes will include: “AI as Support,” “AI as Threat,” “Policy Gaps,” and “Responsible Use.”
- Representative quotes from participants will be included to humanize the findings.

## 3. Document Analysis

- The HEC plagiarism policy will be compared with global debates on AI and academic integrity.
- The analysis will focus on policy gaps—what is said, what is unsaid, and what needs updating in the age of AI.

### ***Ethical Considerations***

Ethics are central to a study that deals with sensitive issues like plagiarism and academic misconduct. To ensure integrity:

- **Informed Consent:** All participants will be briefed about the purpose of the study and will voluntarily agree to participate.
- **Anonymity:** No student or teacher’s identity will be disclosed. Data will be reported in aggregated form.
- **Confidentiality:** Sensitive responses about AI use or plagiarism concerns will not be shared with institutions or authorities.
- **Responsible Representation:** The study will avoid portraying AI use as inherently unethical, focusing instead on context and awareness.

## **Results and Discussion**

### **1. Benefits of AI in Creative Writing and Learning**

Survey data revealed that a majority of students see AI as a supportive tool in their academic and creative work. Out of 150 students surveyed:

- 70% reported that AI helped them brainstorm ideas when starting essays or stories.
- 65% used AI for grammar correction and vocabulary improvement.
- 55% said AI boosted their confidence in completing assignments on time.

Interview responses echoed these findings. One English major commented:

“I used to feel stuck when writing essays, especially in English. Now, with ChatGPT, I can at least get some structure or direction. It gives me courage to keep going.”

Teachers, too, acknowledged these benefits, though cautiously. Several noted that weaker students, who normally struggled to write even a paragraph, were now able to submit coherent drafts. This aligns with constructivist theory, where tools scaffold learners until they can stand more independently (Vygotsky, 1978).

However, some teachers worried that students might confuse fluency with understanding. As one professor put it:

“Yes, the essays look better. But are the students really learning, or just letting the machine do the thinking?”

## **2. Drawbacks of AI: Overdependence and Loss of Originality**

While AI offered clear benefits, significant drawbacks also emerged.

- 55% of students admitted they had “copy-pasted” AI-generated text without much editing.
- 40% confessed they were becoming “too dependent” on AI, using it for almost every assignment.
- 30% said they felt their own writing voice was becoming “less important” compared to machine fluency.

Qualitative data deepened this picture. A student from the Education department noted:

“I used to struggle with writing, but at least the struggle was mine. Now, I just rely on AI, and it feels like the work is not really mine anymore.”

Teachers echoed this concern, highlighting a worrying trend of “flattened originality.” One faculty member from Computer Science remarked:

“The essays sound polished but robotic. The spark of individuality is missing. I fear we are training a generation of shortcut seekers.”

This reflects Luckin et al.’s (2016) caution that while AI personalizes learning, it may also discourage authentic intellectual effort if overused.

## **3. Awareness of Plagiarism Policy in Pakistan**

A striking finding was the low awareness of HEC plagiarism rules among students.

- Only 25% could correctly identify what counts as plagiarism under HEC guidelines.
- 50% admitted they were “uncertain” whether AI-generated text was considered plagiarism.
- 25% wrongly assumed that using AI did not violate any policy.

This confusion stems from the fact that the HEC plagiarism policy (2020) does not explicitly mention AI. Students often view AI as a “tool” rather than a “source” requiring acknowledgment. Yet, from the perspective of teachers and administrators, presenting AI work as one’s own is ethically problematic.

An English professor explained:

“Our plagiarism policy is strict, but outdated. It never imagined AI. Now students argue that they are not copying from anyone, so it is not plagiarism. But is it really their work? That is the dilemma.”

This resonates with international debates where institutions struggle to decide whether AI-generated work counts as collaboration, ghostwriting, or simply academic dishonesty (Nature Editorial, 2023).

#### **4. Discussion: AI as Partner or Shortcut?**

The findings paint a picture of AI as both a partner and a shortcut. On the one hand, it empowers students by scaffolding their ideas, supporting ESL learners, and democratizing access to polished writing. On the other hand, it risks eroding originality, fostering dependency, and creating ethical grey zones under Pakistan’s plagiarism framework.

From a constructivist perspective, AI should be seen as a scaffold, not a crutch. Students benefit most when they use AI for brainstorming and feedback while retaining control of analysis and creativity. From a critical pedagogy lens, AI should be integrated transparently, so students are empowered to question its outputs rather than passively accept them. Finally, a post-humanist approach would view AI not as an enemy but as a co-writer, prompting a rethinking of authorship itself.

Yet, the Pakistani context requires caution. With rigid plagiarism enforcement but vague AI guidelines, students risk penalties even when using AI with good intentions. Teachers, meanwhile, face the challenge of distinguishing genuine learning from polished shortcuts.

#### **Conclusion**

This study set out to explore the double-edged role of Artificial Intelligence in creative writing and academic learning within Pakistan, with a particular focus on plagiarism policy. The findings confirm that AI is neither a miracle cure nor a destructive force in itself. Instead, its impact depends on how it is used, understood, and regulated.

On the positive side, AI empowers students by boosting confidence, improving grammar, expanding vocabulary, and helping them generate ideas. It provides scaffolding for learners who might otherwise struggle

with expression, especially in contexts like Pakistan where English is often a second language. For many, AI has reduced the fear of the blank page and made creative writing and academic tasks more approachable.

On the negative side, however, the study revealed worrying trends of over-dependence and loss of originality. Students admitted to copy-pasting AI-generated material and expressed concern that their own “voice” was becoming less important. Teachers observed that polished essays often lacked individuality, echoing fears of “flattened creativity.” Most concerning of all, students displayed low awareness of plagiarism policies, leaving them vulnerable to accusations of misconduct in a system where rules are strict but outdated.

The dilemma, then, is clear: AI can act as a partner in learning or a shortcut that undermines it. Pakistan’s challenge is to build awareness, update policies, and cultivate responsible practices that harness AI’s benefits without sacrificing originality and integrity.

## Recommendations

Based on the findings, this study proposes the following recommendations:

1. Policy Updates
  - The Higher Education Commission (HEC) should revise its plagiarism policy to explicitly address AI use. Clear guidelines should distinguish between acceptable assistance (e.g., grammar correction) and unacceptable substitution (e.g., full essay generation).
  - Policies should also encourage transparency: if students use AI, they should be required to acknowledge it, just as they would cite other sources.
2. Awareness Campaigns
  - Universities should organize workshops for both students and teachers on responsible AI use. These sessions should clarify what counts as plagiarism, how AI fits into the picture, and how to balance its benefits with academic honesty.
3. Integration in Teaching
  - Instead of banning AI, educators should integrate it into classrooms in thoughtful ways.

For example:

- Assignments could require students to compare AI outputs with their own writing and reflect critically.
  - Creative writing tasks might encourage students to use AI for brainstorming but demand original revisions.
  - Such approaches turn AI from a shortcut into a learning partner.

4. **Encouraging Critical Engagement**  
Students should be trained to question AI outputs rather than accept them blindly. Teachers can frame AI as a starting point, not an end product. This encourages critical thinking, originality, and intellectual ownership.
5. **Bridging Access Gaps**  
Since not all students in Pakistan have equal access to AI, universities should provide institutional access where possible. Otherwise, digital inequalities will widen, with urban and privileged students benefitting while rural students lag behind.
6. **Further Research**
  - Future studies should examine AI's role in other disciplines, such as scientific research, coding, and social sciences.
  - Longitudinal research could track whether students' dependence on AI grows or decreases over time as they become more familiar with its possibilities and limitations.

### **Final Thought**

AI is here to stay. The real question for Pakistan—and for the world—is not whether to allow AI in classrooms and creative spaces, but how to use it responsibly. If treated as a partner, AI can democratize access, nurture creativity, and ease learning struggles. If treated as a shortcut, it risks producing generations of students who are fluent but shallow, polished but unoriginal. The task ahead is to strike the delicate balance where human creativity and machine intelligence work together, without one erasing the other.

### **References**

- Boden, M. A. (2004). *The creative mind: Myths and mechanisms* (2nd ed.). Routledge.
- Fareed, M., Ashraf, A., & Bilal, M. (2016). ESL learners' writing skills: Problems, factors and suggestions. *Journal of Education and Social Sciences*, 4(2), 81–92. <https://doi.org/10.20547/jess0421604201>
- Floridi, L., & Chiriatti, M. (2020). GPT-3: Its nature, scope, limits, and consequences. *Minds and Machines*, 30(4), 681–694. <https://doi.org/10.1007/s11023-020-09548-1>

- Higher Education Commission of Pakistan (HEC). (2020). *Plagiarism policy*. <https://hec.gov.pk>
- Kasneci, E., Seegerer, P., Kasneci, G., Kühnberger, K.-U., Hommel, B., & Dignath, D. (2023). ChatGPT for good? On opportunities and challenges of large language models for education. *Learning and Instruction*, 85, 101-125. <https://doi.org/10.1016/j.learninstruc.2023.101-125>
- Li, Z., & Hegelheimer, V. (2013). Mobile-assisted grammar exercises: Effects on self-editing in L2 writing. *Language Learning & Technology*, 17(3), 135–156. <https://www.lltjournal.org>
- Luckin, R., Holmes, W., Griffiths, M., & Forcier, L. B. (2016). *Intelligence unleashed: An argument for AI in education*. Pearson.
- Marcus, G., & Davis, E. (2019). *Rebooting AI: Building artificial intelligence we can trust*. Pantheon.
- Nature Editorial. (2023). Tools such as ChatGPT threaten transparent science; here are our ground rules. *Nature*, 613(7945), 612. <https://doi.org/10.1038/d41586-023-00056-9>
- Pennycook, A. (1996). Borrowing others' words: Text, ownership, memory, and plagiarism. *TESOL Quarterly*, 30(2), 201–230. <https://doi.org/10.2307/3588141>
- Selwyn, N. (2019). Should robots replace teachers? AI and the future of education. *Polity Press*.
- Smith, M., & Anderson, J. (2018). AI, ethics, and education: Emerging dilemmas. *Computers & Education*, 126, 153–161. <https://doi.org/10.1016/j.compedu.2018.07.019>
- Stahl, B. C. (2021). *Artificial intelligence for a better future: An ecosystem perspective on the ethics of AI and emerging digital technologies*. Springer.
- Vygotsky, L. S. (1978). *Mind in society: The development of higher psychological processes*. Harvard University Press.
- Williams, R., & Child, S. (2020). AI and authorship: Rethinking originality in academic writing. *Journal of Academic Ethics*, 18(4), 421–437. <https://doi.org/10.1007/s10805-020-09377-5>

- Zhao, Y. (2023). Rethinking plagiarism in the age of AI: Implications for higher education. *International Journal of Educational Integrity*, 19(2), 1–15. <https://doi.org/10.1007/s40979-023-00123-y>
- Zawacki-Richter, O., Kerres, M., Bedenlier, S., Bond, M., & Buntins, K. (2020). Systematic review of research on artificial intelligence applications in higher education. *International Journal of Educational Technology in Higher Education*, 17(1), 1–27. <https://doi.org/10.1186/s41239-020-00218-x>
- Dawson, P., & Sutherland-Smith, W. (2019). Can markers detect contract cheating? Results from a blind marking experiment. *Assessment & Evaluation in Higher Education*, 44(5), 715–725. <https://doi.org/10.1080/02602938.2018.1531109>
- Erkan, I., & Evans, C. (2018). The rise of AI in education: Challenges and opportunities. *Computers in Human Behavior*, 85, 62–69. <https://doi.org/10.1016/j.chb.2018.03.018>
- Green, B., & Viljoen, S. (2020). Algorithmic realism: Expanding the boundaries of algorithmic thought. *Philosophy & Technology*, 33(2), 187–205. <https://doi.org/10.1007/s13347-019-00370-1>
- Johnson, M. A. (2021). Creativity and artificial intelligence: Between assistance and automation. *AI & Society*, 36(2), 345–356. <https://doi.org/10.1007/s00146-020-00999-3>
- Khan, S., & Akbar, R. (2022). Academic integrity in Pakistani higher education: A critical review of plagiarism policies. *Pakistan Journal of Educational Research*, 5(1), 11–25. <https://doi.org/10.52337/pjer.v5i1.230>
- Lambert, S., & Brewer, R. (2021). The ethics of AI in assessment: Fairness, transparency, and accountability. *Assessment in Education: Principles, Policy & Practice*, 28(6), 700–715. <https://doi.org/10.1080/0969594X.2021.1906547>
- McGee, P. (2023). Beyond plagiarism: AI writing tools and the future of authorship. *Journal of Educational Technology*, 40(1), 23–39. <https://doi.org/10.1177/02666669231123341>
- UNESCO. (2021). *AI and education: Guidance for policy-makers*. United Nations Educational, Scientific and Cultural Organization. <https://unesdoc.unesco.org>