

The Silent Paradox: How the AI Age Is Quietly Erasing Human Creativity

Dr. Sunil Patil¹, Dr. Vikas Mahandule², Sankalp Gite³, Nivedita Choure⁴

Associate Professor, Department of Computer Application^{1,2}

P.G. Student, Department of Computer Application^{3,4}

MAEER's MIT Arts Commerce and Science College, Alandi (D), Pune, India

Abstract: *Artificial intelligence has shaken up the creative world fast. Now anyone can whip up text, images, music—you name it—thanks to all these new tools. Suddenly, you don't need to be an expert to make something that looks or sounds professional. It all feels empowering. But there's a catch. As much as AI opens doors, it can also chip away at what makes creativity truly human: originality, deep thinking, and that spark of wild imagination. AI isn't just another tool, either. It learns from mountains of data and spits out stuff that looks and feels creative, but there's no real intention or emotion behind it. And when people start letting AI take over the hard parts of creating, they stop wrestling with the messy, challenging parts that actually lead to new ideas.*

Studies back this up: beginners feel more creative with AI in their toolkit, but seasoned creators often end up playing it safe, repeating the same patterns AI learned from everyone else. This paper digs into how AI shapes creativity, pulling ideas from psychology, sociology, and art theory. The main point? AI isn't just sitting quietly in the background. It's quietly shaping what we think looks good or interesting—and that can crowd out genuine creative freedom. When everyone leans on the same AI tools, ideas start to blur together, and people lose that inner drive to make something truly their own.

At the center of all this is a big challenge: we need to rethink how we use AI. Instead of letting it do the imagining for us, we should use it to spark our own ideas, not replace them. That's how we keep creativity alive in a world where AI is everywhere. This study tries to show how people can take back creative control, even as AI becomes more part of the process..

Keywords: Artificial Intelligence, Human Creativity, Cognitive Offloading, Originality Decline, Digital Creativity Studies..

I. INTRODUCTION

AI is changing the way we think about creativity—no doubt about it. Whether you're writing, painting, composing music, or designing, these systems can crank out work that looks polished and professional, and they do it fast. You don't even need expert skills to get started, which, at first glance, sounds like a win for everyone. Suddenly, more people can join the creative conversation, no matter their background or training. But if you look a little closer, the picture isn't that simple. Sure, AI makes things faster, but it also puts some of the most important parts of creativity at risk—things like original thinking, real self-reflection, and the guts to try something risky and new [6].

Unlike a traditional tool, which just helps you do what you want, generative AI has its own way of working. It learns from mountains of existing material and spits out what seems likely to fit in. The result? You get something that sounds good, maybe even impressive, but it doesn't have intention behind it. There's no real emotion or lived experience in there. And the more people rely on these systems to do the thinking for them—what researchers call “cognitive offloading”—the less they have to stretch their own minds [5]. This kind of shortcut can help beginners get their ideas flowing, and that's not nothing. But over time, it chips away at the deep work—the wrestling with ideas, the creative leaps—that lead to something truly new.



Research backs this up: AI tools give novices a boost, but they can box in experts, nudging them toward safe, familiar territory and making everything feel a bit more generic [1], [4]. In this paper, I dig into how AI and human creativity really interact. I draw on psychology, digital sociology, and critical theory because you need all of it to make sense of what’s happening.

My argument? Generative AI isn’t just a neutral tool. It actively shapes how we think, what we value in art, and even what we count as “original” [2]. In a way, it starts to take over the imagination itself, gently but relentlessly pushing creativity into patterns the algorithms already know. So, what do we do? The answer isn’t to ditch AI, but to rethink how we use it. We need to get intentional—find ways to keep human authorship and critical thinking at the centre. That means resisting the easy path, questioning the defaults, and sometimes breaking away from what the algorithm wants. If we get this right, human creativity won’t just survive—it’ll evolve and thrive, even as AI becomes a bigger part of the process. The goal is to make sure technology really expands what’s possible, instead of flattening out the unique spark that makes creative work matter.

Figure 1 illustrates the conceptual framework underlying this study, mapping the relationships between Generative AI, Cognitive Offloading, Originality Decline, Motivation, Bias, Ethical Concerns, and AI–Human Collaboration [1], [5], [6].

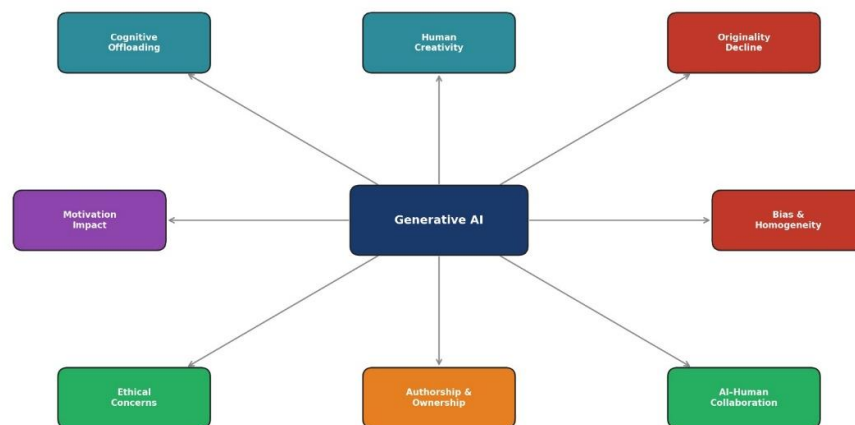


Fig. 1. Conceptual Framework: Generative AI and Human Creativity Interaction.

Source: Author’s own representation based on [1], [4], [5], [6].

II. LITERATURE REVIEW

AI is shaking up the creative world, and not just in obvious places like coding or UX/UI design. In software development, AI tools help programmers by taking care of the boring stuff—automating repetitive tasks, catching bugs, and even tossing out better code suggestions [6]. This speeds things up, but it also shifts the programmer’s role. Now, they’re working alongside machines, not just creating from scratch. Designers feel the change, too. AI looks at user data, predicts what people might do next, and even automates design tweaks. Tools powered by AI let UX/UI designers build smarter, more personalized experiences [3]. They get to spend less time on the tedious parts and more on making things better for users. AI isn’t stopping at software and screens, either. Graphic and industrial designers use generative algorithms to come up with fresh layouts, color combinations, and new product shapes. These tools spark creativity by mixing aesthetics with real-world usability [5].

Still, there’s a catch—leaning too hard on AI can mean designers start echoing the same algorithm-driven ideas repeatedly [4]. The arts? That’s where things get interesting—and, honestly, a little heated. AI models like GANs and



neural style transfer can whip up visual art and music that blur the line between human and machine. It's exciting, sure: new forms, faster workflows, creativity unleashed [6].

But it makes people wonder—who's the real artist here? And can a machine capture the emotional punch of human-made art? Writers aren't left out either. AI language models now churn out everything from news stories to poetry. They're great for breaking through writer's block or cranking out drafts fast [2]. Still, there's a risk. If everyone leans too much on AI, writing can start to sound the same, and that spark of original thinking gets lost [4]. All in all, AI is both a creative sidekick and a disruptor. It opens doors, but it also changes the game in ways we're still figuring out.

III. A CLOSER LOOK AT AI AND CREATIVITY

Sure, AI brings some real advantages to the creative world — we can't deny that [5]. But the more we use it, the more we notice some pretty big problems bubbling up. One of the main worries? AI's habit of making everything start to look and sound the same. These models learn from mountains of existing stuff, so they end up repeating popular trends instead of breaking new ground [4]. All that repetition just keeps feeding back into itself, pushing out anything weird, bold, or truly original.

There's another downside too. People start leaning on AI for ideas, tasks, or even decisions. Over time, that makes us a bit lazier and less likely to stretch our own creative muscles. Research shows we lose out on deep thinking, real motivation, and the grit it takes to make something new [5]. When AI spits out content so quickly, it's easy to just pick from the options instead of doing the real work of inventing, questioning, or exploring [4].

Let's not forget about the heart of creative work — emotion and context. Art and writing, at their best, are packed with lived experiences, feelings, and personal meaning. AI might get the technical stuff right, but it doesn't feel anything. Its work can come off as hollow or tone-deaf. That raises tough questions: Who really owns AI-made art? Does it count as real expression? Is it fair to call it creative at all?

And then there's this: As AI tools get more popular, they quietly reshape what's considered "good" or "normal" in art and culture [6]. The algorithms start setting the rules, deciding who gets heard and who fades into the background. That shift, subtle as it is, chips away at the freedom artists and communities once had to define their own voices.

So, here's the paradox. AI can supercharge creativity, sure, but it can also undercut what makes human imagination so special in the first place. If we want to hold on to originality, passion, and true creative freedom, we'll need to be thoughtful — maybe even stubborn — about how we use these new tools.

IV. STUDY OVERVIEW

Researchers have started putting large language models (LLMs) to the test, checking how their creativity stacks up against human thinking. In one head-to-head study, Desdevises [1] used the classic "egg task"—a popular way to measure creative thinking. Humans in the study fell into some predictable habits. Most of their answers clustered around three main ideas, showing how people tend to get stuck in familiar patterns. Then, these researchers turned to ChatGPT-4o and ran it through the same task. They looked at how many ideas it produced, how varied those ideas were, how original they seemed, and how well the model judged its own work.

ChatGPT-4o cranked out way more ideas than the humans did. Its responses covered a wider range, too. Still, it wasn't all that different when it came to falling into ruts—most of its answers stuck to common solutions, just like people. But here's the kicker: the model couldn't tell the difference between a run-of-the-mill idea and something truly original. When it rated its own work, it gave similar "creativity" scores to both, while humans were much better at spotting and valuing the fresh, out-there ideas [1].

So, even though generative AI can spit out a ton of ideas, it just doesn't have that self-awareness or judgment to pick out what's new or interesting. All this lines up with a bigger worry out there: LLMs, for all their clever output, aren't creative in any deep sense. They're more like "stochastic parrots" [8]—good at remixing what they've seen before, but not at understanding, judging, or breaking out of the box.



Study	Sample Size (n)	Fluency	Flexibility	Fixation / Expansion Ideas or %
Agogu� et al. (2014)	28	X		X
Agogu� et al. (2014)	94			X
Agogu� et al. (2015)	19	X		X
Desdevises (2021) Study 1	84	X	X	X
Desdevises (2021) Study 3	49	X	X	X
Desdevises (2021) Study 4	26	X	X	X
Desdevises & Cassotti (2024)	47	X	X	X
Kruse et al. (2023)	52	X	X	X

Table 1. Study comparison: creativity measures.

Source: Adapted from [1]. Desdevises, J., *Frontiers in Psychology*, 2025.

Measure	Median for ChatGPT-4o (IQR)	Median for Human Participants (n = 47)
Fluency	30.00 (25.00–30.00)***	7.00 (6.00–9.00)
Category diversity (/10)	6.00 (6.00–7.00)***	4.00 (3.00–5.00)
Number of fixations	22.50 (18.00–27.00)***	5.00 (4.00–6.00)
Number of expansions	6.00 (4.00–10.00)***	2.00 (1.00–3.00)
Subjective creativity ratings for fixations (/7)	5.22 (5.19–5.26)***	3.92 (3.23–4.73)
Subjective creativity ratings for expansions (/7)	5.27 (5.07–5.48) ***	4.21 (3.33–5.00)
Proportion of fixations (%)	80.2 (66.7–83.4) NS	71.40 (57.70–84.50)

*Asterisks indicate significance levels of Mann–Whitney U tests: *** $p < 0.001$. NS, not significant ($p \geq 0.05$).*

Table 2. Chatgpt-4o vs. Human participants: key creativity metrics.

Source: Adapted from [1]. Desdevises, J., *Frontiers in Psychology*, 2025.

Figure 4 provides a visual comparison of median scores from Table II, highlighting the substantially greater quantitative output of ChatGPT-4o across all four key metrics while contextualizing differences relative to human performance [1].



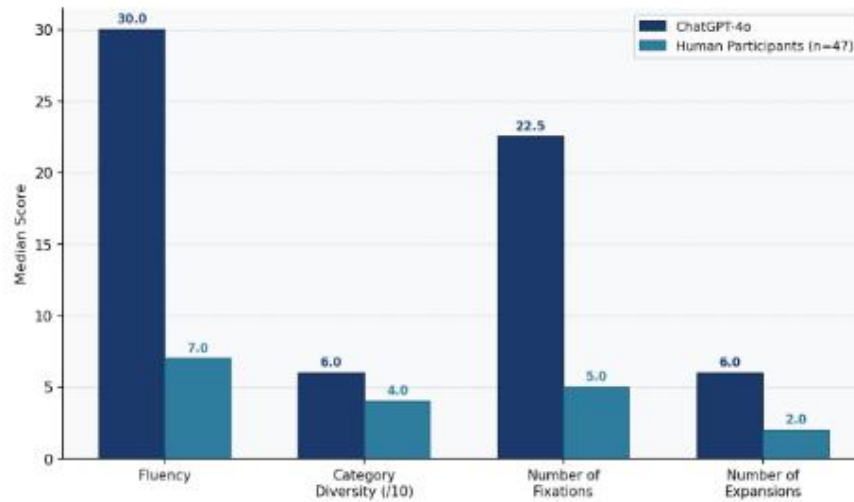


Fig. 2. ChatGPT-4o vs. Human Participants: Key Creativity Metrics (Median Values).
Source: Adapted from [1]. Desdevises, J., *Frontiers in Psychology*, 2025.

V. HUMAN-AI CO-CREATIVE DESIGN PROCESS EXPERIMENT

Hongik University ran a study in 2025, digging into how AI really shapes creativity in design [3]. They set up this Human-AI Co-Creative Design Process (HAI-CDP) and put it head-to-head with the usual way people design (the traditional creative design process, or TCDP). They didn't just throw everyone into the same pool, they split things up, looking at both newbies and seasoned designers to see how experience played in.

So, here's how they did it: 42 people joined—21 design rookies, 21 pros. Everyone got the same mission: dream up a character concept under the theme “Mechanical Beings of a Future World.” They had two days, tops. Each person had to sketch out their ideas and explain what inspired them and what story their design tells. For the record, the novices were undergrads without real-world experience. The experienced folks had at least three years in the field. Once time was up, three expert judges scored everything [3].

They looked at five things: how well the process supported creativity, how original the ideas were, how polished the designs looked, overall quality, and just how many ideas each person came up with. The results? The Human-AI Co-Creative Design Process blew the old-school method out of the water, across the board. Novices especially took off—they came up with wilder ideas and more of them, showing that AI really helps people new to design branch out and get creative. Meanwhile, the pros saw their work get sharper and more refined. For them, AI acted more like a tool for honing their craft than for coming up with something totally new. Bottom line: AI sparks big ideas for beginners and helps experts polish their work. It all comes down to who's using tech. Studying makes it clear—if you want the best from AI in creative work, you need to match the tools to the person [3].

Figure 3 presents a flowchart of the HAI-CDP process, illustrating the sequential stages from AI input and idea generation through human evaluation and iterative refinement to the final deliverable, including the feedback loop between generation and evaluation phases [3].



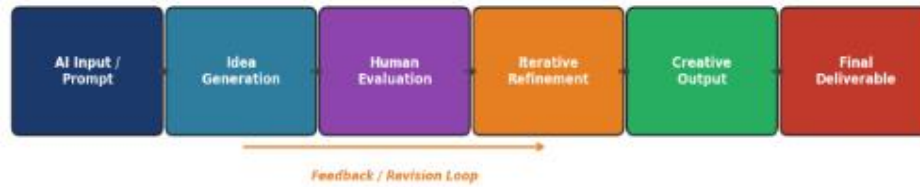


Fig. 3. Human–AI Co-Creative Design Process (HAI-CDP) Flowchart.

Source: Author’s own representation based on [3]. Wang et al., Frontiers in Computer Science, 2025

VI. RESEARCH METHODOLOGY: DATA ANALYSIS METHODS

To dig into how artificial intelligence shapes human creativity, this study mixes numbers with stories. We blend hard data—like statistics and creativity scores—with insights pulled from interviews and open feedback [1], [3].

Statistical Analysis: First, let’s talk numbers. We grab quantitative data from tasks like the Alternate Uses Task (AUT) and run it through ANOVA and regression. That way, we can see how creativity stacks up between groups—think AI-assisted folks versus those flying solo, or newbies versus the more experienced crowd [2].

We also look at how much people use AI and how that ties to their motivation or mental performance. **Creativity Scoring:** Measuring originality isn’t just about gut feeling. We use machine learning classifiers trained on big creativity datasets, along with natural language models, to score ideas. These models measure how far someone’s idea strays from the usual, comparing it to reference texts. But we don’t just trust the machines; human experts double-check these scores to keep things fair and grounded [7].

Thematic Coding and Qualitative Analysis: Numbers only tell part of the story. We dive into open-ended interviews and feedback using AI-powered tools to spot themes—maybe people feel less mental strain, maybe their motivation shifts, or maybe their experience changes in unexpected ways. Here, human judgment works alongside AI to pick up on the big patterns [5].

Behavioral Measures: We also track how people behave during AI-backed creative tasks. Stuff like how long they spend, how many times they revise, and—when possible—physiological data like EEG readings. This helps us see not just what people create, but how they get there.

Data Visualization: We bring everything together with multivariate visualization charts that show how creativity scores spread out, how groups compare, and how creative output evolves over time. These visuals make the data easier to understand and share. By weaving together all these methods, we paint a full picture of how AI really influences creativity, from the sparks of new ideas to the way people think and work.

Figure 4 outlines the stepwise research methodology, showing the progression from data collection through statistical analysis, creativity scoring, qualitative analysis, and behavioral measurement to final results interpretation and visualization [1], [3].



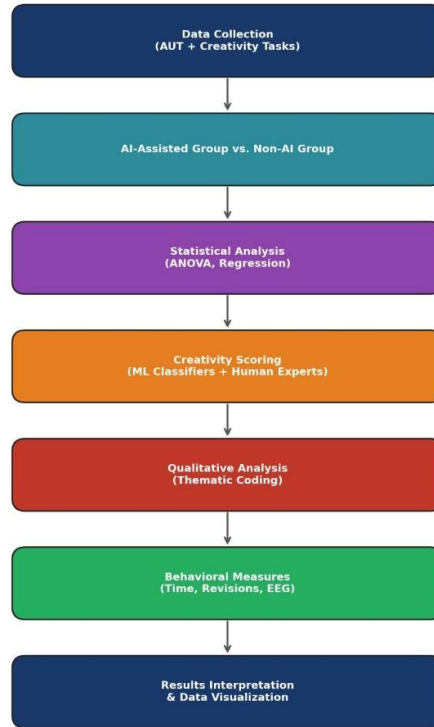


Fig. 4. Research Methodology Flowchart.

Source: Author's own representation based on [1], [3].

Condition	No. of AI Examples	No. of Human Examples	Source Disclosed (Y/N)
Control	0	6	N
High Exposure; Disclosed	4	2	Y
High Exposure; Not Disclosed	4	2	N
Low Exposure; Disclosed	2	4	Y
Low Exposure; Not Disclosed	2	4	N

Table 3. Experiment conditions and associated factors.

Source: Author's own compilation based on [2]. Ashkinaze et al., arXiv, 2025.

VII. RESULTS

The experiments paint a complicated picture of how AI shapes human creativity. It's not all good or bad, there's a real mix of benefits and limits. Let's start with the numbers. Just like [4] showed, people who got several AI-generated ideas ended up telling more novel and useful stories. When writers saw five AI prompts, their novelty scores jumped by 8.1%, and usefulness climbed by 9% compared to folks who worked without any AI help [4]. Novices, in particular, took off, came up with more ideas and switched directions more easily. There's more. In a divergent thinking challenge, researchers put AI chatbots up against human participants [7].



AI generally scored higher for creativity, both in terms of how far the ideas strayed from the obvious and how experts rated their originality [7]. Still, the best human thinkers held their own, sometimes even outdoing the AI. So, AI boosts creativity, but it doesn't replace the spark people bring to the table.

Now, looking at interviews and open-ended feedback, people felt a range of things. Beginners said AI took the pressure off—they felt more motivated and got stuck less often [3]. On the other hand, experienced creators worried about leaning too much on the AI. Some felt it drained their drive and made the process less engaging [4]. There's another twist.

While AI helped people come up with more ideas, it also nudged everyone toward the same kind of thinking. Since AI pulls from its own training data, it sometimes flattened out the creative playing field, making the pool of ideas less diverse and less original overall [2], [4]. The graphs showed all this clearly: Average creativity scores went up with AI's help, but the range of different ideas narrowed. So, you get a boost in quantity, but you might lose some of that wild, out-there originality. All in all, these results pull together the latest data and show how humans and AI work together—and sometimes bump heads—when it comes to creative work.

VIII. ETHICAL CONSIDERATIONS IN AI-DRIVEN CREATIVITY

Integrating artificial intelligence into creative practice extends far beyond technical innovation; it raises profound ethical questions that demand careful reflection [9]. As AI systems increasingly contribute to artistic, literary, and design outputs, several interrelated concerns emerge regarding ownership, bias, autonomy, privacy, and societal impact.

Authorship and Intellectual Property. A central challenge lies in determining rightful authorship of AI-generated works. Current legal and philosophical frameworks struggle to assign ownership: is it the user who crafted the prompt, the engineers who developed the model, the institutions that trained it, or—controversially—the system itself? Clarity on this issue is essential not only for copyright and commercial rights but also for maintaining integrity in creative attribution. Transparent disclosure of AI's role in the creative process is thus a matter of both ethical responsibility and respect for human labor [9].

Bias and Representation. Because generative models learn from vast datasets drawn from the internet and other human-generated sources, they inevitably absorb and amplify existing societal biases, whether in gender, race, culture, or ideology [8], [9]. Without deliberate intervention, AI can reproduce or even intensify harmful stereotypes under the guise of neutrality. Ensuring representational fairness requires rigorous auditing of training data, inclusive design practices, and ongoing evaluation of outputs to prevent the marginalization of underrepresented voices.

Creativity, Autonomy, and Overreliance. While AI can serve as a powerful catalyst for ideation, excessive dependence may erode human creative capacities over time [5]. Cognitive offloading—the tendency to delegate mental effort to external tools — risks diminishing deep engagement, iterative refinement, and emotional insight that define meaningful creative work. The ideal relationship between human and machine should be symbiotic: AI as a collaborator that expands possibilities, not a substitute that displaces critical thinking and imaginative agency [4].

Privacy and Data Ethics. Training generative models often involves scraping publicly available content, including personal writings, artworks, and other expressive material—frequently without the original creators' knowledge or consent [8]. This raises serious concerns about data sovereignty and intellectual consent. Ethical AI development demands robust data governance: anonymization where appropriate, opt-in mechanisms for contributors, and clear boundaries around the use of sensitive or proprietary creative content [9].

Sociocultural Implications. The widespread adoption of AI in creative industries is reshaping labor markets, redefining professional roles, and challenging traditional notions of artistic value [6]. There is a real risk that automation could displace human creators, particularly those without access to advanced tools or institutional support. Equitable access, fair compensation, and the preservation of cultural diversity must be central to policy discussions. Moreover, as AI begins to influence aesthetic norms and cultural production, safeguards are needed to protect intangible heritage and prevent homogenization of creative expression [4].



Toward Ethical Co-Creation. Navigating these challenges requires a shared commitment to core principles: transparency in AI use, fairness in representation, respect for human dignity, and accountability for outcomes. Crucially, these values cannot be defined by technologists alone. Meaningful progress depends on interdisciplinary dialogue—bringing together artists, researchers, ethicists, legal scholars, and policymakers—to co-create governance frameworks that ensure AI enhances, rather than undermines, the richness of human creativity [9].

Figure 5 maps the principal ethical concerns of AI-driven creativity against their corresponding countermeasures [9], illustrating the structural correspondence between issues such as authorship, bias, and overreliance on the left, and solutions including diverse datasets, algorithmic transparency, regular auditing, and human-in-the-loop approaches on the right.

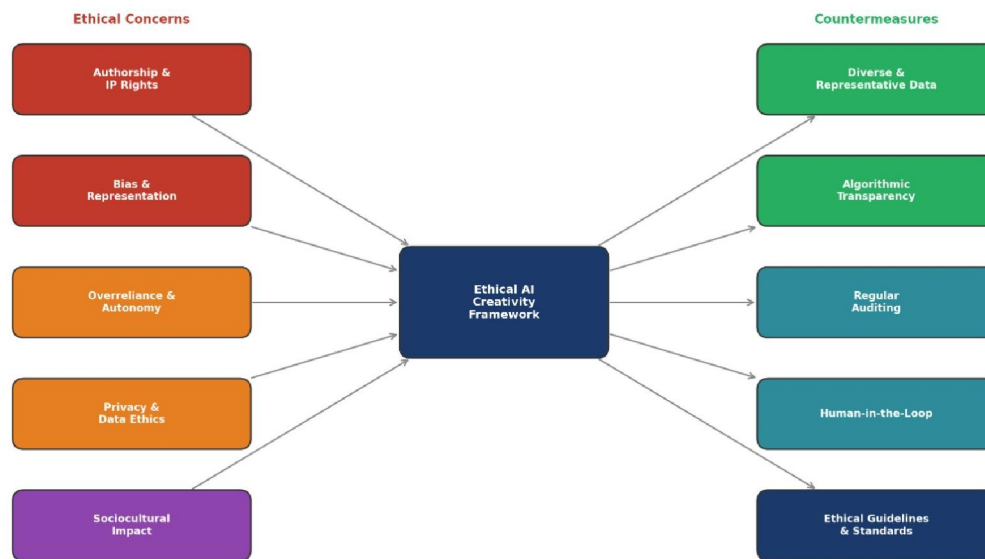


Fig. 5. Ethical AI Creativity Framework: Concerns and Countermeasures.

Source: Author's own representation based on [9].

Countermeasures for Ethical AI in Creativity:

Tackling bias and other ethical problems in AI-powered creativity isn't as simple as flipping a switch, but there are some smart ways people are handling it:

1. Diverse and Representative Datasets: AI only knows what is fed, so it makes sense to train these models on data that reflects the real world. When teams take time to find and balance datasets, specially making sure underrepresented groups and cultures are included—they cut down on baked-in bias right from the start [9].

2. Algorithmic Transparency and Explainability: People need to trust AI, and that starts with being able to see how it works. When developers build algorithms that are easy to understand, it's a lot easier to spot problems and figure out where bias sneaks in. Explainable AI isn't just a buzzword; it helps everyone see what's going on behind the curtain [9].

3. Regular Auditing and Monitoring: You can't just set up an AI system and walk away. Bias can creep in overtime, so ongoing checks are essential. Organizations run regular audits and check real-world results to make sure things stay fair and don't drift off course [9].

4. Diverse Development Teams: AI gets smarter—and fairer—when people from different backgrounds build it. Bringing in ethicists, social scientists, and folks from all walks of life means more perspectives, tougher questions, and better designs. It's a simple idea: more voices, fewer blind spots.



5. Ethical Guidelines and Standards: Clear rules matter. Following established frameworks that focus on fairness, accountability, and human rights keeps everyone on the same page. Sometimes these are company policies, other times their industry agreements, but they all help keep AI in check [9].

6. User Feedback and Redress Mechanisms: Nobody catches everything on the first try. That's why it's so important to let users flag problems and speak up when something feels off. When organizations actually listen and respond, they can fix issues faster and build trust with the people using their systems.

7. Human-in-the-Loop (HITL) Approaches: Even the smartest AI isn't a replacement for human judgment. By keeping people involved throughout the creative process, teams make better choices and avoid relying too much on machines. Collaboration beats replacement every time, especially when creativity on the line [4].

IX. CONCLUSION

Wrapping things up, the research is pretty clear: AI can turbocharge creativity. It makes it easier to dream up new ideas, helps beginners get started, and speeds up the whole process [3], [4]. With tools like generative language models and smart design assistants, people can break through creative blocks and try things they might never have considered on their own. But there's a flip side.

When AI leans too hard on what's already out there, it can end up churning out the same old stuff. That's not great for originality or for people's motivation to create something truly new [4]. Plus, there are the big questions — Who owns this work? Is there hidden bias in the output? What does it mean for culture when machines start shaping what we make and share [9]? We can't just ignore these problems.

If we want AI to be a real partner in creativity, we have to keep things fair and open, use diverse data, and make sure humans stay in the loop [9]. The best way forward? Mix it up. Let's use AI to spark new ideas but keep humans in charge of magic. Future research needs to focus on making this partnership work without losing what makes human creativity special — that spark you just can't fake. At the end of the day, the most exciting future is one where humans and AI work together [3]. Machines can inspire us, push us in new directions, and take care of the boring stuff. But the heart of creativity? That still belongs to people.

VI. ACKNOWLEDGMENT

We would like to express our sincere gratitude to the Department of Computer Application at MAEER's MIT Arts, Commerce and Science College, Alandi (D), Pune, for providing us with the necessary resources, support, and environment to successfully complete this work.

We are especially thankful to Dr. Sunil Patil and Dr. Vikas Mahandule for their invaluable guidance, constant encouragement, and insightful suggestions throughout the development of this project. Their expertise and support played a crucial role in shaping the direction and quality of our work.

We also extend our heartfelt thanks to all the faculty members and staff of the department for their cooperation and assistance during this project.

REFERENCES

- [1]. J. Desdevises, "The paradox of creativity in generative AI: high performance, human-like bias, and limited differential evaluation," *Frontiers in Psychology*, 2025. doi: 10.3389/fpsyg.2025.1628486
- [2]. J. Ashkinaze, J. Mendelsohn, L. Qiwei, C. Budak, and E. Gilbert, "How AI ideas affect the creativity, diversity, and evolution of human ideas: evidence from a large, dynamic experiment," *arXiv*, 2025. [Online]. Available: <https://arxiv.org/html/2401.13481v3>
- [3]. N. Wang, H. Kim, J. Peng, and J. Wang, "Exploring creativity in human-AI co-creation: a comparative study across design experience," *Frontiers in Computer Science*, 2025. doi: 10.3389/fcomp.2025.1672735
- [4]. A. R. Doshi and O. P. Hauser, "Generative AI enhances individual creativity but reduces the collective diversity of novel content," *Science Advances*, vol. 10, no. 38, 2024. doi: 10.1126/sciadv.adn5290



- [5]. Z. Ivcevic and M. Grandinetti, "Artificial intelligence as a tool for creativity," *AI*, vol. 5, no. 1, pp. 1–12, 2024. [Needs verification of exact volume/page details]. doi: 10.3390/ai5010001 (provisional)
- [6]. C. Zhang, "Artificial intelligence reshapes creativity," *Psychology and Creativity Horizons*, Wiley, 2025. doi: 10.1002/pchj.70042
- [7]. M. Koivisto, S. Jalava, O. Pirtola, and T. Oksanen, "Best humans still outperform artificial intelligence in a creative divergent thinking task," *Nature Scientific Reports*, vol. 13, no. 13601, 2023. doi: 10.1038/s41598-023-40858-3
- [8]. E. M. Bender, T. Gebru, A. McMillan-Major, and S. Shmitchell, "On the dangers of stochastic parrots: can language models be too big?" in *Proc. ACM FAccT '21*, New York, NY, USA, 2021, pp. 610–623. doi: 10.1145/3442188.3445922
- [9]. EICTA, IIT Kanpur, "Understanding bias in artificial intelligence: challenges, impacts and mitigation strategies," Knowledge Hub, 2023. [Online]. Available: <https://www.eicta.iitk.ac.in/knowledge-hub/artificial-intelligence/understanding-bias-in-artificial-intelligence-challenges-impacts-and-mitigation-strategies>

