Data Privacy and Security Challenges: The Role of AI in Mediation

Saeema Syed

Mediation is a process where a neutral third-party mediator helps disputants improve their understanding of their situation and one another, and then explore mutually acceptable solutions. Artificial intelligence (AI) can assist in mediation by facilitating communication between parties, efficiently processing vast volumes of data in a case, and identifying the pertinent information useful for the case.[1] AI-based mediation systems can rapidly and efficiently analyze large volumes of data, learn from its patterns, and enhance the mediation process by providing insights into potential settlement options and facilitating effective communication between parties.[2] This not only reduces the time required for a mediation session but also decreases its financial costs, making the process more accessible to those with limited resources. Furthermore, AI's adaptive learning ability enables it to identify patterns in disputes and make informed decisions, particularly in technical or specialized cases where human mediators may lack the requisite expertise.[3] Within seconds, AI technologies can explore billions of possible mediation techniques, tailoring them in real-time to the words and actions of parties in a dispute, thereby optimizing the probability of generating positive momentum at every turn in a mediation session.

But AI systems require substantial amounts of high-quality, structured, machine-processable data, and thus struggle in environments where data is limited or of poor-quality.[4] Due to the privileged, private, and confidential nature of the mediation process, mediation is an area where high-quality, machine-processable data is scarce.

Mediations involve highly personal, intimate, and private information on a party's life and opinions. Sensitive information from the parties may be compromised on an AI mediation platform because of hacking, malware, or viruses, which are common occurrences in software development.[5] Biases from human developers can also impact how data is labeled, processed, and categorized before being used to train an AI model. AI-based mediation technologies can introduce bias in the mediation process and result in unfair treatment of the parties when the training data or the algorithm design is biased.[6] Algorithms can embed biases and stereotypes in their results, creating a feedback loop that perpetuates and exacerbates socioeconomic, ethnic, and gender-based discrimination.[7] AI models are also prone to hallucinations, which occurs when the technology

---

[1] Mansi Jain Garg, *AI and Mediation: A Threat or Helpful Tool for Mediators - An Indian Perspective*, 3 Jus Corpus L.J. 175, 186 (2022).
[2] Audrey Berland, *Artificial Intelligence (AI) and Mediation: Technology-Based Versus Human-Facilitated Dispute Resolution*, JDSUPRA (Mar. 8, 2023), https://www.jdsupra.com/legalnews/artificial-intelligence-ai-and-1573917/ [https://perma.cc/LSQ5-C2RV].
[3] Eyad Ayed Alsamhan, *AI and Online Dispute Resolution: Mediation*, 4 J. Sci. Dev. Stud. Res. 283, 297 (Jan. 3, 2023).
[4] Harry Surden, *Artificial Intelligence and Law: An Overview*, 35 GA. ST. U. L. REV. 1310 (2019).
[5] Sarita & Harsh Kumar, *Mediation and Artificial Intelligence: Future of Dispute Resolution,* 4 Int'l J.L. Mgmt. & Humanities 1472, 1472 (2021).
[6] *Supra* note 2.
[7] Chris Chambers Goodman, *AI/Esq.: Impacts of Artificial Intelligence in Lawyer-Client Relationships*, 72 OKLA. L. REV. 154 (2019).

generates outputs not supported by any known facts.[8] These hallucinations can result from errors or inadequacies in the training data or biases in the model itself.[9]

AI development and implementation in mediation should adhere to ethical frameworks that prioritize fairness, transparency, and respect for human dignity.[10] The slow recognition and regulation of AI technologies by governmental authorities contribute to many concerns about their use in mediations. Not only is it essential to establish more defined regulations to govern the use of AI in mediations, but important enforcement and liability issues need to be addressed as well. These considerations necessitate clear regulatory guidance to ensure AI is applied ethically, responsibly, and effectively in mediations.

[8] Robert Bergman, *Will AI Replace Mediators?*, MEDIATE.COM (Jan. 15, 2024), https://mediate.com/will-ai-replace-mediators-and-neutrals/ [https://perma.cc/QG9Q-72TP].
[9] *Id*.
[10] *Id*.