

Democratizing Law through Digital Transformation: Expanding Access to Justice through Inclusive Legal Technologies

¹Prof. (Dr.) Bhavish Gupta, ²Dr. Govind Prasad Goyal

¹Professor, ²Associate Professor,

^{1/2}IMS Law College, Noida, affiliated to CCS University, Meerut, U.P.

¹guptabhavish@gmail.com, ²govind.goyal@imsnoida.com

<https://doi.org/10.64882/ijrt.v14.iS1.1068>

Abstract

Computerisation of law is a big opportunity and a significant threat to the contemporary jurisprudence. This paper discusses the democratization of access to justice due to inclusion of legal technologies, and eliminates the access to justice gap that is endemic to all marginalized groups in the world. This paper investigates the question of whether technology in fact enhances access or merely creates new forms of exclusion by critically examining some of the new digital legal technology, artificial intelligence applications and online dispute resolution platforms. As evidenced by the paper, despite the opportunities offered by the digital transformation that the elimination of the legal services barriers has never been this minimal, the digital divide, the bias of the algorithms, the privacy of the data, and the loss of the human-centered approach to the legal advocacy remain the issues of concern. The paper relies on the factual data concerning various jurisdictions and it is assumed that the real democratization cannot be confined solely to the use of technologies but should be constructed in a particular fashion with the focus on equity, transparency, and procedural fairness. As it can be seen, participatory legal technologies must be designed with the participation of underserved communities, lawyers, and technologists. Besides, the paper claims that laws should be revised to ensure that such innovations can be utilized in the name of justice and not efficiency. This paper, lastly, recommends a normative model of evaluating digital law intervention, which identifies that the limitation of access to justice to technological access but must imply meaning, meaning, and empowerment of the law processes.

Keywords: digital transformation, access to justice, legal technology, inclusive design, algorithmic justice, legal empowerment

Introduction

The opportunities of digital transformation in the legal systems have fascinated scholars, practitioners, and policymakers with the prospects of having never been so accessible to justice. The proponents of technology believe that AI, cryptography, computerized lawyers and web-based systems can break down the ancient walls which have long denied the vulnerable populations access to legal protection and redress. However, this optimism about technology is to be questioned. The issue to be addressed, however, is not whether the digital tools have the potential to enhance the legal accessibility, but rather whether they put structural inequalities that create the gaps in justice or are simply digital replications of their counterparts.

The right to access justice is one of the pillars of democratic governance and respect of human rights. Still, even large segments of the world population are functionally inaccessible to formal legal systems because of the economic meltdowns, physical isolation, illiteracy, and excessive complexity of institutional structures. Based on the estimates that the World Justice Project indicated, over five billion people fail to have meaningful access to justice that has far-reaching consequences on poverty eradication, social stability and human development. The potential solution as well as the potential complication, that emerges in this context is digital transformation.

The paper is a critical discussion of the issue of digital transformation/access to justice connection, and how the issue of inclusive legal technologies could indeed democratize the law yet with the severe risks that these technologies entail. This discussion is carried out on four dimensions which include the hypothetical foundations of access to justice in the digital world, current applications of legal technology and their implications, a critical evaluation of limitations and exclusions, and normative recommendations about truly inclusive digital legal change.

Theoretical Foundations: Redefining the Right to Access to Justice in Digital Era

The conventional conceptions of the access to justice have mostly focused on the removal of the formal barriers to the legal institutions, courts and professional representation. However, the digital transformation demands introducing new structures that involve technological literacy, data sovereignty, algorithmic accountability and participatory design.

The capabilities approach created by Amartya Sen and Martha Nussbaum would provide a helpful theoretical basis on which one can base the analysis of digital legal interventions on. The access to justice in this perspective requires more than formal access to legal services, but actual access to the value, perception, and negotiation of legal procedures. Then, digital technologies should not be viewed in terms of their technical complexity but on the capacity to empower human capabilities to become actors of law.

Additionally, the procedural justice approach also dwells on the fact that the participants ought to be provided with fair process, voice, and dignity by legitimate legal systems. Digital legal technologies are a threat to these values because they are more concerned with efficiency than interaction, more concerned with automation than exposition, or more concerned with standardisation than situational sensitivity. The theoretical dilemma involves a trade-off between the scalability of technology and procedural fairness and human dignity.

It has also been observed by critical legal scholars how law itself is a power technology, an arrangement of social relations, and a resource distribution. Digital legal transformation is no neutral technical progression then but a contentious zone, as opposed visions of justice, efficiency and social ordering collide. In a situation where legal technology is perceived as a required political and not a required technical situation, then democratization is bound to play a role.

Currently used applications: Mapping the Digital Legal Landscape

Modern legal technology landscape is a category of apps the implication of which on access to justice varies. They may be divided into the following areas: automated generation of legal

documents, legal research and prediction with the help of artificial intelligence, online dispute resolvers and digital legal education and empowerment.

Computer based document assembly allows one to produce legal documents without the services of an attorney, which might help cut the cost and make them more accessible. Automated wills, contract and incorporation services platforms have also become common all around the world. It has been found that these tools are effective when dealing with middle-income earners whose legal cases are simple but fail to sufficiently respond to the complex situations or vulnerable groups that require the delicate legal scrutiny.

Legal predictions and legal decision support applications of artificial intelligence have more problematic implications. Algorithms used in the assessment of risks are getting more and more influential in bail, sentencing, and child welfare decisions. Although those in support believe that such systems are more consistent and less prone to human bias, there is a great deal of evidence showing that such systems often reinforce and increase existing patterns of discrimination especially those based on race and the poor and economically marginalized groups. Even accountability and contestability of procedural justice is compromised by the inaccessibility of many proprietary algorithms.

Online dispute resolution forums provide alternative means of litigation to the otherwise geographically distant populations, or those who cannot afford the traditional legal systems. ODR has been used in a number of jurisdictions to resolve small claims, family and consumer disputes. There are indications that these systems have the capacity to boost participation levels and shorten the resolution time but there are issues related to power imbalances, no legal representation, diminished procedural safeguards in digitally mediated negotiations.

Digital legal education programs such as mobile applications that provide legal information, interactive rights advisory, and community paralegal training show a great potential of empowering the law. Indian, Kenyan, and South African studies show that carefully designed digital legal literacy interventions have the potential to increase awareness of rights and promote help-seeking behavior in the marginalized population. Nevertheless, long-term effects can be achieved through a continued community-based approach and connection to the wider strategies of empowerment of law.

Critical Analysis: Limitations, Exclusions and Structural Barriers

Digital legal transformation has significant constraints that have put a threat of replicating or widening existing gaps in justice despite the promising applications. Special attention should be paid to five critical issues, namely the digital divide, algorithmic bias and opacity, data privacy and surveillance, dehumanization of legal processes, and regulatory inadequacy.

The most basic obstacle to inclusive legal technology is the digital divide. Digital legal services pose meaningful usage which would demand internet connectivity, proper equipment, digital literacy and in most instances financial resources. In the world, more than 2.6 billion individuals are not connected to the internet; there are significant inequalities based on geography, income, age, gender, and disability. Revenues of digitally excluded individuals are huge even in highly technological countries. The creation of technologies aimed at enhancing

the law that lacks consideration of this digital divide will automatically benefit privileged groups and push the most vulnerable people even farther down the list of priorities.

Algorithms are biased due to many sources such as biased training data, incorrect assumptions of design, and proxy discrimination where apparently neutral variables are associated with protected attributes. Recent studies have reported racial discrimination in recidivism forecast formulas, gender discrimination in employment and creditworthiness evaluations, and racial socioeconomic discrimination in automated benefit decisions. These biases have a direct impact of eroding equal justice when algorithmic recommendations are relied upon more in making legal decisions. This is because the proprietary character of most systems does not allow meaningful audit and accountability which induces a worrying lack of accountability in consequential legal determination.

Legal processes which are currently being digitalized enhance the concern of data privacy and surveillance. Legal issues are often related to very sensitive personal data in connection to family relations, economic conditions, medical issues, and possible law breaches. The digital justice produces data trails that are susceptible to data theft, data monetizing, and government spying. In the example of immigrant populations, victims of domestic violence, or political dissidents, online access to the law can be very threatening to them. Without effective data protection schemes and institutional efforts that look convincing, even online legal assistance may deter the help-seeking behaviour of those people who most need legal protection.

There is also another problem that is an object of concern and that is dehumanization of the legal procedures as a result of over automation. Law is an imperative area of human judgment, contextual acquaintance, empathy and moral judgment, which is inimitable by algorithms. Legal services that are robotized may work in cases of routine but not those cases that are complex, unclear and emotionally sensitive and require human beings with sensitive knowledge. Moreover, the studies of procedural justice have continuously demonstrated that the importance of an individual to be listened to and comprehended in the courts as well as treated with decency. The automated interactions alone are a threat to these significant dimensions of lawful systems of law.

The legal regimes have been incapable of coping with the rapid rate of changes in technology that has left litany gaps in governance where legal technologies are being carried out with little or no control, responsibility or quality. Majority of digital legal platforms exist in regulatory grey spaces as opposed to traditional legal service providers that are typically regulated by professional measures, licensure and ethics. This puts in grave question quality assurance, error liability, practicing law without licent and consumer protection.

Inclusive Legal Technologies: Towards Normative Framework and Recommendations

To truly democratize law with the help of a digital transformation, the focus on technological solutionism needs to be replaced with a focus on deliberate, equity-focused design and execution. This part suggests a normative model through which inclusive legal technologies may be assessed and created, and policy suggestions made.

There are six principles in the normative framework, which include participatory design, capability building, preservation of procedural fairness, transparency and contestability, data sovereignty and protection, and hybrid human-technology systems. Participatory design requires engagement of underserved communities, frontline providers of legal services, and other interested parties during the development of technologies and not foist solutions developed by others. This will make sure that technologies are responsive to real needs and challenges as opposed to perceived issues.

To foster capability enhancement, it is necessary to evaluate technologies not only in terms of the metrics of use but also in terms of their ability to increase the capabilities of users in the legal understanding, agency, and empowerment. Technologies must not substitute but augment human legal services, and offer ways to greater involvement as opposed to shallow automation. The maintenance of procedural fairness requires efficiency to be achieved without sacrificing voice, dignity, explanation, and meaningful participation in legal processes of determining the actions of the individual in their fundamental rights and interests.

Transparency and contestability mean that algorithmic systems acting in the field of law must offer substantial explanation of their operations and decision-making, be effectively challenged and appealed, and be audited by an independent party on whether they are biased and accurate. There should be no place in consequential legal determinations of proprietary black-box algorithms. In the case of data sovereignty and protection, this requires significant safeguards and structures that enable people to have control over vulnerable legal information, have clear consent procedures, reduced data gathering, high security, and complete restrictions on commercial use or illegal dissemination.

Lastly, human-technology systems understand that best performance is usually achieved when technology is widely used in combination with human intelligence as opposed to full automation. Technologies are supposed to empower human legal professionals by supporting them instead of substituting them so that they can be able to support more people better without necessarily removing the important human aspects of legal assistance.

On this basis, there are a number of policy suggestions. One, governments and financing agencies must focus on investing in digital infrastructure and digital literacy interventions particularly to underserved populations, and acknowledge that access to technology is a form of justice that is necessary. Second, the regulatory frameworks should be updated to set clear quality standards, accountability mechanisms, and systems of control over the work of digital legal service providers, which can be a special regulatory organ or an increase in the competence of professional regulatory authorities.

Third, before implementing automated decision systems in a legal setting, they should be mandatory in terms of algorithmic impact evaluation, and the specific focus should be on discriminatory effects of such systems, implications on procedural fairness, and meaningful contestability. Fourth, legal technology development must consider principles of universal design and accessibility adequately, at the outset, so that the technology can be used by various groups, such as people of disabilities, low literacy, or low technology familiarity.

Fifth, legal technology projects by governments should focus on open-source development, which allows transparency, communal adjustments and prevents lock-in. Sixth, technology literacy, algorithmic accountability, and digital ethics should be incorporated into legal education and professional training and equip legal professionals to act more critically and maximize the benefits of technological tools without violating the interests and rights of clients. Seventh, cross-sector cooperation among legal practitioners, technological innovators, community institutions, and vulnerable groups should be encouraged to achieve comprehensive practices in reducing technological, social and structural aspects of access barrier. Lastly, continuous empirical studies and testing should determine whether digital legal interventions do in fact positively affect access to justice by marginalized populations beyond the anecdotal evidence.

Conclusion

Digital transformation is an actual opportunity of enhancing the availability of justice, and it needs to utilize this opportunity critically through the limitation, prejudices, and risks surrounding technology. Democratizing law goes beyond the technological resource usage but involves a total reinvention of legal systems in which equity, inclusion and human-centred approach are the main focus. They must be participatory technologies that are inclusive and developed by participatory approaches, which enhance human capabilities, procedural fairness, transparent and accountable, have data sovereignty, and intelligently linked to human expertise. Technological innovation cannot be used to address the gap in justice. The structural inequities that generate legal exclusion must be dealt with by structural solutions that will deal with poverty, discrimination, power inequities and institutional access. Technology is not a replacement of sufficient funding of legal aid, pro bono services, law reform, community legal empowerment, and political will to focus on justice rather than efficiency.

Whose interests will the technologies serve? This is the ultimate question as the legal systems undergo the process of a digital transformation. The digital legal technologies without a deliberate dedication to inclusion, accountability, and equity are in danger of becoming instruments of additional exclusion, monitoring, and regulation. Authentic democratization must be to guarantee that technology works to administer justice to everyone, especially those who have not enjoyed its benefits all through. The way ahead requires care, involvement and commitment to justice as the scale of technological advancement.

References

1. Asif, S., Pal, R., Dubey, V., Kumari, P., & Shrivastava, S. (2024). Internet of Things (IoT) Integration with 5G and 6G Wireless Technologies. In *Advanced IoT Technologies and Applications in the Industry 4.0 Digital Economy* (pp. 309-327). CRC Press.
2. Barocas, S. and Selbst, A. D. (2016). "Big Data's Disparate Impact," *California Law Review**, Vol. 104, pp. 671-732.
3. Cappelletti, M. and Garth, B. (1978). *Access to Justice: A World Survey*, Sijthoff and Noordhoff International Publishers, pp. 1-124.
4. Chahal, D. (2024). An economic analysis of organic farming in India. *The Indian Economic Journal*, 9, 135–145.

5. Cummings, S. L. (2012). "The Pursuit of Legal Rights—and Beyond," *UCLA Law Review*, Vol. 59, pp. 506-539.
6. Dubey, V., Singh, S., Kumari, P., Patel, K., Jahan, T., & Dubey, S. (2026). AI-Driven Business Systems: Pioneering Innovation and Transformation. In *Integrating AI and Machine Learning into Business and Management Education* (pp. 297-332). IGI Global Scientific Publishing.
7. Dwivedi, R., & Hasan, N. (2025). Enhancing brand awareness and loyalty through gamification in the metaverse. In *Addressing Practical Problems Through the Metaverse and Game-Inspired Mechanics* (pp. 259-288). IGI Global Scientific Publishing.
8. Genn, H. (1999). *Paths to Justice: What People Do and Think About Going to Law*, Hart Publishing, pp. 45-89.
9. Hasan N, Agarwal C, Joshi A, Rahal D, Traisa R, Sharma S (2025;), "The two-way influence of green banking practices and green electronic word of mouth in driving green trust and green loyalty: a trust transfer perspective". *International Journal of Ethics and Systems*, Vol. ahead-of-print No. ahead-of-print. <https://doi.org/10.1108/IJOES-10-2024-0326>
10. Hasan, N., Nanda, S., Agarwal, M.K. *et al.* Evaluating the mediating effect of financial literacy between fintech adoption in microfinance services. *Int J Syst Assur Eng Manag* (2024). <https://doi.org/10.1007/s13198-024-02256-4>
11. Hasan, N., Singh, A. K., & Dwivedi, R. (2024). Determinants of FinTech adoption by microfinance institutions in India to increase efficiency and productivity. *International Journal of Business Innovation and Research*, 35(3), 393–411. <https://doi.org/10.1504/IJBIR.2024.142306>
12. Hasan, N., Singh, A. K., & Tariq, H. (2020). Sustainability and outreach of microfinance institutions in India. *Shodh Sarita*, 9(7). <http://shabdbooks.com/Vol-9-Issue-7-2020/>
13. Katsh, E. and Rabinovich-Einy, O. (2017). *Digital Justice: Technology and the Internet of Disputes*, Oxford University Press, pp. 112-156.
14. Lind, E. A. and Tyler, T. R. (1988). *The Social Psychology of Procedural Justice*, Plenum Press, pp. 61-95.
15. Nussbaum, M. C. (2011). *Creating Capabilities: The Human Development Approach*, Harvard University Press, pp. 18-45.
16. Pasquale, F. (2015). *The Black Box Society: The Secret Algorithms That Control Money and Information*, Harvard University Press, pp. 3-58.
17. Rani, A. (2023). Green farming in India: issues and policy perspective.
18. Rhode, D. L. (2004). *Access to Justice*, Oxford University Press, pp. 3-67.
19. Sandefur, R. L. (2019). "Access to What?," *Daedalus*, Vol. 148, No. 1, pp. 49-55.
20. Sen, A. (1999). *Development as Freedom*, Oxford University Press, pp. 87-110.
21. Susskind, R. (2019). *Online Courts and the Future of Justice*, Oxford University Press, pp. 89-134.
22. United Nations Development Programme (2019). *Justice for All: A Practitioner's Guide to a Human Rights-Based Approach to Access to Justice*, UNDP, pp. 12-45.

23. Wadhawan, D.N., C. S. A. K. (2023). The evolving landscape of digital marketing: Trends, impacts, and opportunities in India. *Journal of Data Acquisition and Processing*, 38(2), 2157–2168.
24. Wadhawan, N., R. K. A. (2020). Understanding e-commerce: A study with reference to competitive economy. *Journal of Critical Reviews*, 7(8), 805–809.
25. Yeung, K. (2018). "Algorithmic Regulation: A Critical Interrogation," *Regulation and Governance*, Vol. 12, pp. 505-523.

Author Biographical Sketch

Prof. (Dr.) Bhavish Gupta is an inquisitive, dedicated and illustrious academician. He pursued his LL.M from Aligarh Muslim University, Aligarh (University Topper) and MBA from University of Allahabad, Allahabad. In order to broaden his horizon on various aspects of Constitution he secured Post Graduation Diploma in Constitutional Law (PGDCL) from the Institute of Constitutional & Parliamentary Studies, New Delhi. He was awarded Ph.D degree in “Quantum of Punishment & Sentence in India: An Appraisal” by Dr. B. R. Ambedkar University, Agra (Formerly Agra University, Agra). With a couple of graduate and post graduate degrees and meritorious performances he has successfully handled a gamut of diversified functional areas in academics. His great interest resonates across Criminal Laws.

A meticulous, astute and tenacious planner, he started his career as Assistant Professor at Lloyd Law College, Greater Noida. Thereafter, he joined Amity Law School, Delhi (affiliated to GGSIP University, Delhi) as Assistant Professor (Sr.) and was soon promoted to Associate Professor. Then he joined Delhi Metropolitan Education, Noida as Professor cum HoD (Law) for about 5 years. Thereafter, worked as Professor cum Dean (Law) at KCC School of Law, Greater Noida (Affiliated to GGSIP University, Delhi). Presently he is serving as Professor at IMS Law College, Sector 62, Noida (affiliated to CCS University, Meerut).

Dr. Gupta is having to his credit several research papers and articles on prominent topics in various UGC Listed journals and books of repute which depicts his indefatigable pursuit towards research. His participation in Seminars and Conferences both at National & International level has always been valued and appreciated. He has also edited several books which add to his intellectual capital.

Dr. Govind Prasad Goyal

Dr. Govind Prasad Goyal currently serves as the Dean of Students’ Welfare at the Institute of Management Studies (IMS), Noida, one of India’s leading institutions for professional education. In his role, Dr. Goyal provides visionary leadership in student development, well-being, and academic enrichment, fostering an inclusive and dynamic campus environment where learners are empowered to achieve excellence.

Dr. Goyal’s academic journey is distinguished by a deep commitment to interdisciplinary research, particularly at the intersection of language, gender studies, and the dynamics of law in contemporary society. His scholarly work emphasizes clarity and accessibility in communication, advocating for language that serves justice and public empowerment.

Additionally, his research engages critically with gender justice, exploring how systems interact with gendered experiences and contribute to social equity.

With an expansive publication record that reflects both depth and breadth, Dr. Goyal has authored twelve books.

Dr. Goyal’s institutional affiliation with IMS Noida places him at the forefront of innovative legal pedagogy and research. Within the college, he champions initiatives that integrate technology, social justice, and critical theory to prepare students for the challenges of 21st-century legal practice.

Beyond research and administration, Dr. Goyal actively mentor’s student scholars, facilitates interdisciplinary collaborations, and contributes to workshops, conferences, and policy dialogues that shape the future of professional education.