A STUDY ON PREDICTIVE JUSTICE POWERED BY AI

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Abstract:

There are numerous benefits to the advancement of predictive justice for the efficient functioning of the legal system. The application of predictive algorithmic models can improve legal certainty by incentivizing judges to base their decisions on earlier decisions. Apart from standardizing the way the law is applied, it can also assist stakeholders in making informed decisions before a court case, encourage timely case resolution, referrals for sentencing, out-of-court settlements, and prioritize cases where violations seem likely. The challenge is creating a system that maintains fair procedure while simultaneously addressing the concerns of those impacted by this automated justice system. This necessitates a strong policy that lays out the guidelines for predictive justice in court cases and puts the necessary protections in place. Judicial reforms that integrate the work of the central government through the Ministry of Law and Justice with the judiciary should enable predictive justice.

Keywords*: Justice System, AI, Laws and Courts.*

Introduction:

Numerous flaws in the Indian legal system hinder its ability to function and deliver justice to the general public. To address these deficiencies, cooperation between the government, the judiciary, and the general public is required. As part of the Indian government's efforts to address the issues facing the legal system, more judges will be appointed, the judicial system will be modernized, new courtrooms will be constructed, anti-corruption laws will be introduced, free legal aid services will be offered to the economically disadvantaged segments of society, legal aid clinics will be established, and technology-enabled procedures like e-filing and e-courts will be implemented. The judiciary has also implemented training programs and established special courts to handle cases involving marginalized groups in an effort to advance impartiality and fairness.

Review Literature :

Mitisha Gaur - April 28, 2024 - An In-Depth Exploration of Predictive Justice with AI

This paper investigates the various attempts of adopting predictive justice systems and proposes the incorporation of the principles of natural justice, explainability and context base deliberations as core tenets for the creation of a trustworthy Predictive Justice system. The use of predictive analytics in the legal sphere to facilitate insights and the reliance on AI-systems by the judiciary and the government bodies is a train which every jurisdiction across the world has bought a ticket to. This race to automate often precludes the safety of vulnerable groups who end up bearing the brunt of algorithm-based exploitation. Predictive justice applications are not envisaged as substitutions for natural persons carrying out deliberative functions on behalf of courts and administrative bodies, however in cases where they're

deployed as intelligence augmentation tools, they must work within known legal parameters which uphold core legal tenets such as principles of natural justice, right against discrimination, right to good administration etc.

Federico Galli – 2023 - Ai Approaches To Predictive Justice: A Critical Assessment

This paper addresses the domain of predictive justice, exploring the intersection of artificial intelligence (AI) and judicial decision-making. It first introduces the concept of predictive justice, referring to the ongoing debate surrounding the potential automation of judicial decisions through AI systems. Then examination of the current landscape of AI approaches employed in predictive justice applications, providing a comprehensive overview of methodologies and technological advancements. Then, a delve into the phenomenology of predictive justice, highlighting the diverse spectrum of legal predictions achievable with contemporary AI systems.

Matthew Dylag – 2024 - The Impact of Artificial Intelligence on Access to Justice: Predictive Analytics and the Legal Services Market

This paper examines how developers of predictive analytics-a technology wherein artificial intelligence (AI) is being used to predict the future outcomes of legal disputes-position their product vis-à-vis access to justice. In particular, it examines how two companies market their software to better understand how this technology is being integrated into the legal services market and to comment on the software's potential impact on access to justice.

Bhishm Khanna, 2021 - Predictive Justice: Using AI for Justice

This paper examines the advancement in the field of predictive justice provides a number of benefits for the efficient working of the justice administration. Deployment of predictive algorithmic models can provide legal certainty by nudging judges to align their decisions with the past decisions. Apart from standardising application of legal rules, it can also allow stakeholders to take informed decisions before proceeding with a court case, encourage speedy disposal of cases, sentencing reference, out-of court settlement and prioritising cases where violation seems likely. The challenge is to have a mechanism that respects fair procedure and accommodates concerns of those impacted by this automated justice system.

Mohammed Farook – 2024 - Enlightening Justice: Empowering Society Through AI-Driven Legal Assistance

This paper explains why one of the biggest issues facing modern society is the pervasive legal ignorance that denies many people their liberties and access to fairness. In order to address this issue, this paper offers a revolutionary solution that will use cuttingedge technology to give people from all areas of life full legal advice and support. Through in-depth research of numerous legal situations and locations of crimes, this paper provides practical suggestions and technical support to equip individuals with knowledge of pertinent laws and necessary proof.

Objectives:

- To know about Indian Judicial System
- To understand the flaws of Indian Judicial System
- To study the advantages of AI powered Judicial System

Research Methodology:

This research is entirely based on secondary data. The secondary data is collected from various articles, blog and other web sources.

Limitations:

The present study is based only on secondary sources and has not analysed the current scenario and perception of people on AI powered Indian Judicial System.

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Challenges faced in the Criminal Justice System:

Globally, criminal justice systems deal with numerous difficulties. To effectively address them, coordinated and integrated approaches are necessary, and the UN is a key player in this process. The need to address new types of criminality and improve responses to long-standing criminal behaviours, such as violence against women and children and corruption, are among the challenges, as are the consistently high rates of crime and violence. Inadequate financial and human resources, as well as a hefty caseload, plague many criminal justice systems worldwide. High levels of impunity, delays in the administration of justice, excessive use of pre-trial detention—often for extended periods of time—inadequate use of alternative sentencing options, overcrowded prisons that are unable to fulfill their rehabilitative function, and high reoffending rates are just a few of the problems that result from this. The various parts of the criminal justice chain are frequently compartmentalized and not integrated, and criminal justice systems frequently lack coordination and cooperation with other sectors—such as the social welfare, health, and education sectors—that are crucial to guaranteeing integrated responses to crime and violence.

Violence against women:

Regardless of the stage of development, violence against women is sadly pervasive worldwide. Intimate partner violence, sexual violence and harassment, human trafficking for sexual exploitation, female genital mutilation, and child marriage are just a few of the crimes that exhibit its physical, sexual, and psychological manifestations. Worldwide, one in three women has been the victim of sexual or physical abuse, typically at the hands of an intimate partner. A partner or family member kills one out of every two female homicide victims. Violence against women and children is not considered a serious crime in many societies, and as a result, it goes unreported and unaddressed by the legal system. This is true even though they have negative and enduring effects on women and girls' safety, health, and well-being as well as that of their families and communities. Coordination between the social, police, health, and justice sectors is essential to ensuring victims are supported and protected.

Violence against children:

Millions of children worldwide are impacted by violence, which transcends cultural, class, educational, financial, and ethnic boundaries and poses a serious threat to sustainable development. The majority of child abuse cases are not officially sanctioned by law, but they are implicitly accepted by society. It frequently goes unreported, unpunished, and unpunished. Children have a right to be shielded from physical and psychological abuse. States must take all necessary steps to support children who have been victims of violence in order to aid in their physical and mental healing as well as their social reintegration. Additionally, states should make sure that detention is reserved for extreme circumstances, that children in legal trouble are not placed in adult prisons, that all justice interventions support their reintegration into society, and that they are shielded from torture and other cruel, inhuman, or degrading treatment or punishment.

Support and protection for victims:

In criminal justice systems, victims of crime are frequently the ones who suffer the most. In order to increase incident reporting and prevent secondary victimization and re-victimization, it is imperative that victim protection and support be increased. Another step that can improve protection and support for victims of crime is the availability of legal aid. For female offenders, who usually come from underprivileged and marginalized backgrounds, this is especially crucial. It may be a helpful tool for giving

victims more assistance. The needs of victims for justice and compensation, the needs of communities and societies for safety and protection, and the need to hold offenders accountable must all be carefully balanced by criminal justice systems in order to ensure offenders' rehabilitation and social reintegration and lower recidivism rates.

Lengthy Court Proceedings :

One of the major issues facing the Indian judicial system is the length of time it takes for courts to decide cases. Indian courts typically take a lot longer to reach a decision than courts in many other nations. It typically takes three to fifteen years, though some cases may require more time.

Lack of Adequate Infrastructure and Resources :

The second major issue facing the Indian judicial system is a lack of adequate resources and infrastructure. Judges, courts, and support personnel are in short supply in Indian courts, which has a negative effect on the judicial system's efficacy and efficiency. Many courts have antiquated and insufficient physical infrastructure, with subpar amenities and technology. The health and wellbeing of court users are negatively impacted by the lack of basic amenities in many court buildings, such as adequate ventilation, sanitary facilities, and clean drinking water.

High Pendency Rate or Backlog of Cases:

The number of cases that are still pending in the courts and have not been resolved in a reasonable amount of time is known as the pendency rate or backlog of cases. A backlog of cases and delays in the administration of justice result from a lack of courtrooms and support personnel. Longer wait times, delays in the administration of justice, and a decline in trust in the legal system are all consequences of the backlog of cases. It also has an impact on the judicial system's efficacy and efficiency, making it difficult to give priority to pressing issues and administer justice on time.

Corruption and Biases:

Bias is defined as unfair or partial treatment, whereas corruption is defined as the abuse of authority. Although the majority of Indian judges and court employees are truthful and diligent in their work, there have been cases of bias and corruption in the legal system for private benefit. Biases and corruption in India's legal system cause evidence to be manipulated and unfair verdicts to be rendered.

Inadequate Access to Legal Services:

Many people have limited access to legal services, especially those from marginalized communities. Additionally, it results in underrepresentation. The lack of legal aid providers is one of the main causes of insufficient access to legal services. While there are legal aid services in cities, people who live in rural or isolated areas frequently have a difficult time getting legal help. The high cost of legal fees (including enormous advocate fees) is another factor contributing to insufficient access to legal services. Accessing justice is difficult for many people because they cannot afford the cost of legal services. Inadequate access to legal services is also a result of the general public's lack of legal literacy and the complexity of legal processes.

Overworked and Underfunded Courts

There are fewer resources and more work for the Indian legal system. As a result, India's judicial system deals with issues like excessive expenses, a dearth of technology, poor legal counsel, and more..

Importance of AI powered Predictive Justice :

Predictive justice is the process of forecasting the results of legal disputes by analyzing vast amounts of data using AI-enabled technologies. In nations like the United States and the United Kingdom, these technologies have gained popularity in the context of public administration and policing. The extensive body of research in this field shows that predictive

analytics in judicial systems has grown in popularity over the past 20 years. Because AI tools can process a large amount of data that humans cannot, they are more precise. When humans and AI collaborate, they can "outperform either working in isolation." Predictive analytics enabled by AI models can help our legal systems address a number of issues, including protracted case backlogs, inconsistent legal application, inadequate dispute resolution, etc. However, in order to fully utilize this technology, various AI models need to adapt to a range of legal contexts. In this sense, it is imperative that the Indian legal system begin the process of implementing predictive justice. Proper legal contextualization will benefit indigenous AI systems and provide a chance to develop fair use principles. In order to create datasets and better categorize various aspects of laws and cases that can subsequently be fed into the AI model, a sufficient gestation period is necessary for the development of predictive AI tools. This directly affects the ability of predictive AI to operate with consistent accuracy. This means that in order to have enough time to address various aspects of AI development, the development process must begin as soon as possible.

Need For Predictive Justice:

Towards legal certainty - Predictive models can eliminate arbitrary factors in judicial decision-making by excluding factors that have no bearing on the case's merits. Thus, it can facilitate standardization, which will lessen the system's bias, arbitrariness, and inconsistency.

Increasing efficiency - An improvement in outcome prediction accuracy can lessen information asymmetry between parties and encourage them to reach a settlement rather than pursue a drawn-out legal battle. Additionally, it may make it possible to identify and prioritize cases where violations appear likely in advance. Judges can concentrate on cases that call for

greater expertise from their side by automating cases with simpler rule application.

Strengthening judicial institutions - Regarding a specific judge, a low predictability as determined by an AI may indicate the inclusion of legally irrelevant factors. As a result, it could prevent the courts from applying the law in an unjust and inadequate manner. Adoption of a transparent, equitable, and explainable AI is also anticipated to boost public confidence in the legal system.

Self-Reliance: aiding the Atma Nirbhar Bharat Mission - Three more factors make the integration inevitable due to the quick development of predictive analytics and predictive AI modelling: (a) improved contextualization

(b) autonomous principle development that resists foreign paradigms (c) strengthening internal capacity to support the Atma Nirbhar Bharat Mission.

Reducing dependence on private sector - Currently, the commercial private players in the legal market are responsible for the majority of initiatives involving systematic data-based decision-making. The equality of terms between parties is weakened by unequal access to the technology. Reliance on the private sector can be decreased by implementing principle-based algorithms.

Although predictive AI is intended to create more equitable contexts, it must not be definitive. AI must support judges, not take their place. After providing compelling arguments, judges must be permitted to depart from the AI. The term "explainable AI," or "XAI," describes techniques that make it easier for people to comprehend how a machine learning model produced its results. By avoiding algorithmic bias, XAI can assist judges in challenging conclusions. Biases can be checked by the Oversight Authority through disclosures about the data used to train algorithmic models, the assumptions used in their creation, and a risk assessment plan for mitigation.

This will enable external researchers, auditors, and other stakeholders to conduct meaningful analysis. Private companies and public universities may collaborate on research projects. Leverage may be applied to corporate social responsibility (CSR) vehicles. To avoid unwanted influence from profit-seeking actors, the government can maintain proprietary rights over the data and technology.

Conclusion:

By implementing prediction technology, the goal of minimal government and maximum governance can be achieved by creating an automated system that can handle the different problems that our courts face without the need for constant intervention. NITI Aayog's "National Strategy for AI," which aims to achieve #AIforAll, is in line with the development of AI. The legal sector will undoubtedly be disrupted by AI. Therefore, the practical strategy is to benefit from it while maintaining the moral values of justice and equity. By launching its AI portal, SUPAC, the Supreme Court has taken the appropriate action in pursuit of this. As noted, there are several efficiency issues plaguing our judiciary that predictive justice can help with. Predictive analytics can lead to informed decision-making at each stage of a legal proceeding. Overall, the legal profession can greatly benefit from the intersection of data science and law, and predictive justice is the ideal first step in that direction.

Scope of Study:

- AI Apps for people to fight their own cases.
- AI Systems for Lie Detections and Truth Manipulations.
- AI Systems to counter Rogue AI Systems

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