

TURKIYE'S ARTIFICIAL INTELLIGENCE LAW PROPOSAL:

# ANALYSIS OF THE FIRST ATTEMPT TO REGULATE AI AND COMPARISON TO EU LEGISLATION



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COMPARISON TO EU LEGISLATION
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The Al Law Proposal ("Proposal"), submitted to the Turkish Grand National Assembly on June 24, 2024, aims to establish a regulatory framework for artificial intelligence (AI) in Turkiye. Inspired by the European Union's Al Act, the Proposal seeks to enhance the safe, ethical, and fair use of Al, protect personal data, and safeguard privacy rights. It covers all Al system stakeholders, including providers and users. Key components include risk management, compliance requirements, and penalties for violations. However, the Proposal is less detailed compared to European standards and lacks connections to existing laws on product safety and liability. It primarily addresses current AI technologies but could benefit from broader and more inclusive definitions and frameworks. While aiming to build trust and encourage innovation, the Proposal may also increase costs and administrative burdens for businesses. For a more effective approach, a comprehensive AI law with sector-specific regulations and adaptable legal mechanisms is recommended to balance technological advancements with societal and economic interests.

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## AI AND LAW

The term "artificial intelligence" ("AI") is commonly believed to have first been used in computer science in August 1955 in a research proposal by John McCarthy, Marvin L. Minsky, Nathaniel Rochester, and Claude Shannon.² John McCarthy introduced the term 'Artificial Intelligence' defining it as 'the science and engineering of making intelligent machines, especially intelligent computer programs. "AI and law" mainly involves applying computer science and mathematical techniques to make the law more understandable, manageable, useful, accessible, or predictable. This idea is not entirely new; it can be traced back to the 1600s with Gottfried Leibniz, a mathematician who co-invented calculus and was also trained as a lawyer.³ He was one of the first to explore how mathematical methods could improve the legal system.⁴

In the sense that computer science uses the term today, legal science began exploring AI in the 1960s. Early documents envisioned using AI to convert trial transcripts into a computer-readable format for more efficient processing,<sup>5</sup> to analyze client information and predict the likelihood of winning a case, to estimate potential damages, to analyze statutory law, and to process evidence and case law.<sup>6</sup>

Legal AI can be understood as the use of technologies like machine learning, natural language processing, speech recognition, legal robotics, image recognition, expert systems, neural networks, and logic programming in the context of legal issues. The importance of Al has grown significantly due to its ability to handle vast amounts of data efficiently. Al produces more accurate results because it can quickly and thoroughly test large datasets, making it a popular topic in the legal field. Handling resources manually is time-consuming and expensive, often leading to dissatisfaction among clients. Legal Al has proven to be highly effective in various areas, including case-based reasoning, document analysis, deontic logic, intelligent search, and more. 8

In more recent times, since the mid-20th century, researchers have actively applied ideas from computer science and AI to the field of law. The development of AI in law mirrors the broader history of AI research.<sup>9</sup> Initially, AI in law focused on knowledge representation and rules-based legal systems. Most of this research took place in university labs, especially in Europe. From the 1970s through the 1990s, many early AI and law projects aimed to formally model legal arguments and create computer-processable versions of legislation and legal rules.<sup>10</sup>

Over time, AI has been expanding into various fields by enabling computers to take on complex tasks that used to require significant human effort. With greater accuracy and speed, AI is helping lawyers simplify their work processes. New legal AI tools like Catalyst, Ross Intelligence, and Matlab, along with natural language processing, are improving dispute resolution, making the law clearer, and increasing access to justice. These tools also present new challenges to traditional law firms by introducing advanced models that enhance service delivery. 12

- 2 J. McCarthy, M. L. Minsky, N. Rochester, C. E. Simon. (2006, Dec.). "A Proposal for the Dartmouth Summer Research Project on Artificial Intelligence, August 31, 1955." Al magazine. [On-line]. 27(4), pp. 12-14. Available: https://ocs.aaai.org/ojs/index.php/aimagazine/article/viewFile/1904/1802.
- 3 See Giovanni Sartor, "A Treatise of Legal Philosophy and General Jurisprudence", Vol. 5: Legal Reasoning 389-90 (Enrico Pattaro ed., Springer 2005).
- 4 Ibid
- 5 Krausová, A. (2017) "Intersections Between Law and Artificial Intelligence," International Journal of Computer (IJC), 27(1), pp. 55–68. Available at: https://ijcjournal.org/index.php/InternationalJournalOfComputer/article/view/1071.
- 6 İbid.
- 7 J. Dabass, B.S. Dabass. "Scope of artificial intelligence in law. Preprints", 2018060474 (2018). doi: 10.20944/preprints201806.0474.v1
- 8 İbid.
- 9 Harry Surden, "Artificial Intelligence and Law: An Overview," 35 GA. ST. U. L. REV. 1305 (2019) page 1327, available at https://scholar.law.colorado.edu/faculty-articles/1234.
- 10 Ibid.
- 11 Dabass n.6, Ibid.
- 12 İbid.



#### AI LAW IN EU: OVERVIEW

Governments globally are developing regulations to address the perceived risks associated with Al. The United States has issued an Al Executive Order,13 while the UK government has released a non-binding Declaration of Principles.<sup>14</sup> China has implemented a business-friendly, light-touch AI regulation, primarily designed to encourage technological advancement.<sup>15</sup> The European Union ("EU") introduced the Al Act on April 21, 2021. Later, on June 14, 2023, the European Parliament began inter-institutional negotiations on AI regulation. The regulation, 16 titled "Regulation (EU) No 2024/1689 Introducing Harmonized Rules on Artificial Intelligence and Amending Certain Union Legislative Acts (EU) 2024/1689," was published in the EU Official Journal on July 12, 2024. This regulation outlines the rules for the marketing of Al systems, the provision of Al-related services, and the prohibition of certain Al applications.

#### A. Aim of the EU AI Act

The EU Al Act is designed to be a product safety regulation aimed at reducing risks to humans from using Al systems. This type of regulation works well for products with a single purpose, where the risks can be easily assessed. Many older Al systems were created for one specific application. However, the challenge arises with the newer general-purpose Al models, like OpenAl's ChatGPT, Meta's Llama, or Google's Gemini, which can be used for a wide range of purposes. This makes it difficult to assess all possible risks and create regulations for every potential use. The Al Act addresses this by including a general requirement to avoid harming fundamental human rights. However, one of the co-architects of the Act in the European Parliament noted

that this mix of product safety and fundamental rights criteria is not perfectly suited to regulating AI models.<sup>18</sup>

The Al Act categorizes Al systems used in the EU based on their risk levels, no matter where they are developed. Most Al systems are classified as minimal risk and are not subject to regulation. Limited risk systems, such as chatbots and Al-generated content, must follow transparency rules, like labeling or watermarking, to ensure users are informed.<sup>19</sup> Al systems that pose unacceptable risks, like those used for remote biometric identification, facial recognition databases, or social scoring, are banned. Exceptions exist for medical and security purposes, but these require court approval and must uphold fundamental rights. The Al Act primarily focuses on high-risk Al systems, which are between limited and unacceptable risk levels. These systems interact with people in areas like education, employment, and public services. The Act lays out detailed rules to assess whether and how these high-risk systems can be safely used.20

#### B. Core Rules of the Al Act: Risk-Based Approach

The EU Al Act sets general rules for developing, selling, and using Al products, services, and systems in the EU. It applies to all industries and introduces a detailed safety framework based on four risk levels: (1) unacceptable-risk, (2) high-risk, (3) limited-risk, and (4) minimal/no-risk. The emphasis of the Act is expected to be on the unacceptable-risk and high-risk categories, which have received significant attention during the amendments by the EU Parliament and Council, as well as in the trilogue discussions.

First, AI systems that present an unacceptable risk by violating EU values and threatening fundamental rights will be banned in the EU. According to the political agreement, the EU AI Act will prohibit certain practices, such as biometric categorization systems that use sensitive attributes (like

- 13 See https://www.whitehouse.gov/briefing-room/statements- releases/2023/10/30/fact-sheet-president-biden-issues-executive-order-on-safe- secure-and-trustworthy-artificial-intelligence/.
- 14 See https://www.gov.uk/government/publications/ai-safety-summit-2023-the-bletchley-declaration/the-bletchley-declaration-by-countries-attending-the-ai-safety-summit-1-2-november-2023.
- 15 Zhang, A. (2024) 'The Promise and Perils of China's Regulation of Al', University of Hong Kong Faculty of Law Research Paper 2024/02, available at https://ssrn.com/abstract=4708676.
- 16 Regulation (EU) 2024/1689 of the European Parliament and of the Council of 13 June 2024 laying down harmonised rules on artificial intelligence and amending Regulations (EC) No 300/2008, (EU) No 167/2013, (EU) No 168/2013, (EU) 2018/858, (EU) 2018/1139 and (EU) 2019/2144 and Directives 2014/90/EU, (EU) 2016/797 and (EU) 2020/1828 (Artificial Intelligence Act) (Text with EEA relevance), available at: <a href="https://eur-lex.europa.eu/eli/reg/2024/1689/oj">https://eur-lex.europa.eu/eli/reg/2024/1689/oj</a>.
- 17 Bertin Martens, "The European Union AI Act: premature or precocious regulation?", Bruegel Analysis, (March 7, 2024), available at: https://www.bruegel.org/system/files/2024-03/the-european-union-ai-act%3A-premature-or-precocious-regulation%3F--9793\_0.pdf.
- 18 Kai Zenner, 'Some personal reflections on the EU Al Act: a bittersweet ending,' 16 Feb 2024, available at https://www.linkedin.com/pulse/some-personal-reflections- eu-ai-act-bittersweet-ending-kai-zenner-avgee".
- 19 Bertin n.17, Ibid.
- 20 Ibid.

political, religious, or philosophical beliefs, sexual orientation, or race); indiscriminate collection of facial images from the internet or CCTV to build facial recognition databases; Al systems that exploit people's vulnerabilities (due to factors like age, disability, or socioeconomic status); and some forms of predictive policing.<sup>21</sup>

Secondly, AI systems that could cause substantial harm to health, safety, fundamental rights, the environment, democracy, or the rule of law will be categorized as high-risk. This includes certain critical infrastructures for instance in the fields of water, gas and electricity and medical devices.<sup>22</sup> High-Risk AI Systems must go through a mandatory CE-marking process before they can enter the market which is explained in Article 43.<sup>23</sup> This certification process also covers the training, testing, and validation of machine learning datasets.

Thirdly, AI systems deemed to be of limited risk — such as chatbots, some emotion recognition systems, biometric categorization systems, and those creating deepfakes—will face fewer transparency requirements.<sup>24</sup> These requirements will involve, among other things, informing users when they are engaging with an AI system and labeling synthetic content, including audio, video, text, and images, to clearly indicate that it has been artificially created or altered.<sup>25</sup>

Finally, AI systems that do not fall into any of the three main risk categories, such as recommender systems or spam filters, are classified as minimal or no-risk. The EU AI Act permits the unrestricted use of these minimal-risk AI systems and encourages the adoption of voluntary codes of conduct.<sup>26</sup>

Al systems that could cause substantial harm to health, safety, fundamental rights, the environment, democracy, or the rule of law will be categorized as high-risk"

#### C. Enforcement and Penalties

The EU AI Act is expected to be mainly enforced by national market surveillance authorities in each Member State. Additionally, a new European AI Office within the EU Commission will handle various administrative tasks, set standards, and enforce the new regulations, to ensure European-wide coordination. The European AI Board, made up of representatives from member states, will serve as a coordination platform and provide advice to the Commission.<sup>27</sup>

Penalties for breaching the EU AI Act will vary based on the type of AI system, the size of the company, and the seriousness of the violation. These fines will range from:

- 7.5 million euros or 1.5 percent of a company's total worldwide annual turnover (whichever is higher) for the supply of incorrect information; to
- 15 million euros or 3 percent of a company's total worldwide annual turnover (whichever is higher) for violations of the EU AI Act's obligations; to
- 35 million euros or 7 percent of a company's total worldwide annual turnover (whichever is higher) for violations of the banned Al applications.<sup>28</sup>

A key result of the trilogue negotiations is that the EU AI Act will now include more reasonable limits on administrative fines for smaller companies and startups. Additionally, the Act will enable individuals or entities to report non-compliance issues to the appropriate market surveillance authority. With the risk-based approach, the Act aims to ensure that AI in the EU is reliable, ethical, and legally sound, while respecting democratic values, human rights, and the rule of law.<sup>29</sup>

#### D. Evaluation of the Al Act

The Al Act's ambitious goals and broad approach have received mixed reactions. Supporters praise the EU for taking a proactive stance on Al challenges and setting a global standard for regulation. They see the Al Act as an essen-

- 21 European Commission, Press Release, "Commission welcomes political agreement on Artificial Intelligence Act," (9 December 2023)
- 22 European Commission Press Release, supra note 11.
- 23 The Al Act (n.15), article 43
- 24 [n.20], supra note 4
- 25 (n.20), supra note 11
- 26 İbid.
- 27 [n. 20] supra note 4, 11
- 28 Ibid., supra note 4.
- 29 Mauritz Kop, "EU Artificial Intelligence Act: The European Approach to AI", Stanford Vienna Transatlantic Technology Law Forum, Transatlantic Antitrust and IPR Developments, Stanford University, Issue No. 2/2021. https://law.stanford.edu/publications/eu-artificial-intelligence-act-the-european-approach-to-ai/.

tial measure to ensure AI is used responsibly and ethically, building public trust and helping AI benefit society.<sup>30</sup> Critics argue that the AI Act's strict regulations might stifle innovation and reduce the advantages of AI. They believe the risk categories are too severe and that the compliance demands could be too heavy for smaller AI developers. However, supporters of the AI Act argue that its careful risk assessment and balanced approach manage to encourage innovation while protecting society from potential risks.<sup>31</sup>

The EU AI Act has its upsides and downsides. It aims to make AI safer, more transparent, and ethical, which could boost trust and reduce harm to society. However, this raises the need to discuss what "ethics" really means for complex AI systems and how to properly evaluate them. The law might also increase costs and bureaucracy, especially for businesses, with some industries affected more than others. Critics argue that a single AI Act might not work well due to the variety of algorithms and uses, preferring sector-specific rules. Others worry the law does not fully protect fundamental rights and data privacy. It will be important to watch how the law plays out and make changes if needed.

03

## TURKIYE'S ATTEMPT TO DEVELOP AN AI ACT

The rapid development of AI technologies has raised concerns about the need for legal regulations to use them. Aiming to establish a regulatory framework for the development, use and deployment of AI systems in Turkiye, The Proposal<sup>32</sup> has been submitted to the Presidency of the Turkish Grand National Assembly on June 24, 2024. In the grounds of the Proposal, it is stated that AI is "...creating revolutionary changes in critical areas such as health, education, security and transportation and rapidly increasing

its effectiveness ...<sup>33</sup>" In this context, it's suggested that a legal framework is needed to prevent potential violations of personal rights and freedoms due to misuse or abuse of Al.

#### A. Purpose and Scope of the Proposal

The main goal of the Proposal is to enhance the benefits of Al for society by ensuring its safe, ethical, and fair use, protecting personal data, and safeguarding privacy rights and maximize the benefits of Al while minimizing the risks and potential harms. The Proposal applies to everyone involved with Al systems, including providers, users, importers, and those impacted by these systems.

The first article of the Proposal titled "Purpose and Scope" states that the purpose of the Proposal is to ensure the safe, ethical and fair use of Al and to protect personal data and prevent violations of privacy rights. Then, it is stated that the Proposal covers the providers, distributors, users, importers and distributors of artificial intelligence systems and the persons affected by these systems.

The second article titled "Definitions"<sup>34</sup> defines the terms Artificial Intelligence, Provider, Distributor/User, Importer, Distributor and Artificial Intelligence Operators.

With the third article titled "Fundamental Principles,"<sup>35</sup> the fundamental principles to be followed during the development, use and distribution of AI systems are defined as Security, Transparency, Fairness, Accountability and Confidentiality. These principles aim to ensure the development and use of AI in a responsible, safe and ethical manner.

The fourth article, "Risk Management and Assessment," states that risk assessments should be conducted during both the development and use of AI systems as part of risk management. High-risk systems must be registered with relevant authorities, undergo conformity assessments, and have special measures applied to them. The article explains that these risk assessments should be done in three steps: identifying potential hazards, evaluating them, and minimizing both the risks and the chances of those hazards occurring.

- 31 *Ibid*.
- 32 https://cdn.tbmm.gov.tr/KKBSPublicFile/D28/Y2/T2/WebOnergeMetni/e50ccc8a-ab90-45fa-a553-76b880c78fb8.pdf (last accessed on September 1, 2024).
- 33 Ibid. Article 1.
- 34 Ibid. Article 2.
- 35 Ibid. Article 3.
- 36 Ibid. Article 4.

<sup>30</sup> Giuseppe Ciccomascolo, "First-Ever Al Regulation: EU's Al Act Pros and Cons," (December 11, 2023) available at: https://www.ccn.com/analysis/eu-ai-act-pros-cons/.

The fifth Article, titled "Compliance and Inspection," requires all AI operators, including providers, users, importers, and distributors, to follow the Proposal and related regulations. Supervisory authorities are expected to be given "broad powers" to monitor compliance and detect any violations. These powers include overseeing AI development and usage, conducting conformity checks, requesting information and documents from AI operators, and imposing penalties for violations. The goal is to continuously monitor AI systems and take action when needed.

In the sixth article titled "Violation and Sanctions," fines are set for the use of prohibited Al applications, breach of obligations and provision of false information.

The seventh and eighth articles titled "Enforcement" and "Execution" provide that if the Proposal is accepted, it will enter into force on the date of its publication in the Official Gazette and its provisions will be executed by the President of the Republic.

#### B. Pros and Cons of the Proposal

As expected, Turkiye's AI Proposal has sparked public debate, with people discussing both its benefits and drawbacks for society and businesses. Here are some key pros and cons of the AI Proposal based on the commentary among public:

- Building trust in AI: Turkiye's AI Proposal is designed to make people more comfortable with AI by ensuring that it is clear, understandable, and overseen by humans. If AI is seen as safe and ethical, more people might start using it, leading to greater adoption.
- Protecting rights: The proposed law aims to safeguard important rights like privacy and prevent discrimination. This could help reduce some of the negative effects that AI might have on society.
- Encouraging innovation: By requiring testing and certification for high-risk AI systems, the Turkiye's AI law Proposal could promote innovation. It creates fair conditions for companies working with AI and could lead to more investment in new technologies by managing potential risks.
- Increased costs and paperwork: The Proposal could lead to higher expenses and more paperwork for businesses and consumers. High-risk Al systems, in particular, might be costly for everyone, including

the government, which will have to ensure the rules are followed.

- Responsibility for AI: The Proposal makes it clear that companies will be held responsible if their AI systems cause any harm. If an AI system fails, the company or those managing it could be liable.
- Different impacts on industries: Since the Proposal is all about AI, its effects might not be the same for every industry. Some sectors could be more affected by the law than others.

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#### C. Comparison with EU Legislation

With the introduction of the EU Act on Artificial Intelligence ("EU AI Act"), the European Union has led the way in regulating AI systems. This Proposal is significant as it marks our country's initial move in this area, in comparison to the established EU AI Act. The EU's regulations use a risk-based approach and impose strict rules on high-risk AI applications, emphasizing transparency, accountability, and the protection of human rights. While the Proposal aims to achieve similar goals, it is lacking in scope and detail compared to the EU AI Act, and the similarities between the two are limited.

The Proposal's definitions are lacking compared to those in the EU Al Act. It would be helpful to clearly define terms like 'risk' and 'reasonably foreseeable misuse' to avoid confusion and misuse of Al. The current definitions are not detailed enough to cover the latest Al technologies and are more complex than other laws and regulations in this field. It would be better to adopt a more general and inclusive definition of Al, similar to the EU Al Act, to better reflect the current technology. Since these definitions will guide how the regulations are applied, it's important to make them clear and comprehensive.

<sup>37</sup> Ibid. Article 5.

<sup>38</sup> Ibid. Article 6.

<sup>39</sup> Ibid. Article 7.

<sup>40</sup> Ibid. Article 8.

While the Proposal mentions principles similar to those in the EU AI Act, it does not go beyond naming them. The EU AI Act's six principles are specifically tailored to the benefits and needs of the AI sector. In contrast, the Proposal lacks clear frameworks for its fundamental principles, and it's unclear how these principles will be applied in practice. The Proposal focuses on risk assessments and oversight. In contrast, the EU AI Act conducts different assessments for various risk levels and sets specific requirements to address potential societal issues if these requirements aren't met. It also aims to identify and prevent both known and unknown risks. While the Proposal has a similar goal, it only briefly and superficially addresses how to identify different risk groups and manage existing and potential risks.

The Proposal, consisting of 8 articles is less detailed and comprehensive compared to European regulations"

## 04 CONCLUSION

The Proposal, consisting of 8 articles is less detailed and comprehensive compared to European regulations. Its lack of connection to other laws, like those on product safety and liability, might complicate the interpretation and application of related regulations. The Proposal seems to focus mainly on the current state of Al. To foster Al development and use in Turkiye, it would be beneficial to establish a broad Al law and then create specific regulations for different sectors. Given the rapidly evolving nature of Al, it's important to develop flexible legal frameworks that can quickly adapt to new developments and balance scientific, social, and economic interests.

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