УНИВЕРЗИТЕТ У ИСТОЧНОМ САРАЈЕВУ
ПРАВНИ ФАКУЛТЕТ

и

ЕВРОПСКА ОРГАНИЗАЦИЈА ЗА ЈАВНО ПРАВО

МЕЂУНАРОДНИ САВЕЗ ПРАВНИКА

ИНСТИТУТ ЗА УПОРЕДНО ПРАВО

ЗБОРНИК РАДОВА

„Право: узрок или посљедица“

Том III

COLLECTION OF PAPERS

“Law: cause or effect”

Vol. III

XIV Научни скуп поводом Дана Правног факултета,
Међународни научни скуп
одржан 25. октобра 2025. год. на Палама

УДК 34(082) ISBN 978-99997-47-08-0

Источно Сарајево, 2026. год.

UNIVERSITY OF EAST SARAJEVO
FACULTY OF LAW

and

EUROPEAN PUBLIC LAW ORGANIZATION

INTERNATIONAL UNION OF LAWYERS

INSTITUTE FOR COMPARATIVE LAW

COLLECTION OF PAPERS
"Law: cause or effect"
Vol. III

ЗБОРНИК РАДОВА
„Право: узрок или посљедица“
Том III

The XIV Scientific conference on
The occasion of the Day of the Faculty of Law,
International scientific conference,
held in Pale, 25 October 2025

UDC 34(082) ISBN 978-99997-47-08-0

East Sarajevo, 2026

ЗБОРНИК РАДОВА
XIV Научног скупа поводом Дана Правног факултета,
који је у организацији
Правног факултета Универзитета у Источном Сарајеву,
и суорганизацији
Европске организације за јавно право,
Међународног савеза правника и
Института за упоредно право,
одржан 25. октобра 2025. год. на Палама, на тему:
„ПРАВО: УЗРОК ИЛИ ПОСЉЕДИЦА“

Издавач
Правни факултет Универзитета у Источном Сарајеву
Алексе Шантића 3, 71420 Пале
тел. 00387 57 226 609 / факс 00387 57 226 892
http://www.pravni.ues.rs.ba / *dekanat@pravni.ues.rs.ba*

За издавача
Проф. др Горан Марковић, декан

Коуредници
Проф. др Димитрије Ћеранић
Проф. др Горан Марковић
Проф. др Свјетлана Ивановић
Проф. др Сања Голијанин
Доц. др Сања Крешталица
Проф. др Самир Аличић
Проф. др Радислав Лале

Лектор и коректор за српски језик
Проф. др Нина Ћеклић

Лектор и коректор за енглески језик
Мр Нинослава Радић, наставник страног језика

Техничка припрема
Проф. др Димитрије Ћеранић
Доц. др Брано Хаџи Стевић / Доц. др Мирјана Пупић
Доц. др Ђорђе Перишић / Виши асс. Ивана Лазаревић, ма
Виши асс. Љубана Сладић, ма / Доц. др Драгана Дамјановић
Проф. др Ђорђе Мариловић / Невена Пустивук

Штампа
Графомарк, Лакташи

Тираж
65 примјерака

Зборник је реферисан у HeinOnline, EBSCO OPEN ACCESS и Central and Eastern European Online Library (CEEOL)

COLLECTION OF PAPERS
The XIV Scientific conference on The occasion of The Day of The Faculty of Law, on general topic "Law: cause or effect", which is organized Faculty of Law, University of East Sarajevo,
in cooperation with the
European Public Law Organization,
International Union of Lawyers, and
Institute for Comparative Law,
on 25. October 2025, in Pale

Publisher
Faculty of Law, University of East Sarajevo
Alekse Šantića Str. 3, 71420 Pale
phone. 00387 57 226 609 / fax 00387 57 226 892
http://www.pravni.ues.rs.ba / *dekanat@pravni.ues.rs.ba*

For the Publisher
Full Professor Goran Marković, dean

Edited by
Associate Professor Dimitrije Ćeranić
Full Professor Goran Marković
Associate Professor Svjetlana Ivanović
Associate Professor Sanja Golijanin
Assistant Professor Sanja Kreštalica
Full Professor Samir Aličić
Associate Professor Radislav Lale

Proofreading for the Serbian language
Full Professor Nina Ćeklić

Proofreading for the English language
Ninoslava Radić, MA (Linguistics), English language teacher

Technical preparation
Associate Professor Dimitrije Ćeranić
Assistant Professor Brano Hadži Stević / Assistant Professor Mirjana Pupić
Assistant Professor Đorđe Perišić / Senior Teaching Ass. Ivana Lazarević
Senior Teaching Ass. Ljubana Sladić / Assistant Professor Dragana Damjanović
Associate Professor Đorđe Marilović / Nevena Pustivuk

Printing
Grafomark, Laktaši

Circulation
65 copies

COLLECTION OF PAPERS included in base of journals and e-books: HeinOnline, EBSCO OPEN ACCESS and Central and Eastern European Online Library (CEEOL)

J. Ćeranić Perišić, *The EU Artificial Intelligence Act: Regulatory Framework and Implementation Challenges*, Collection of Papers "Law: cause or effect", East Sarajevo 2026, pp. 335–351.

UDC/УДК 340.134:004.8(061.1EU)
REVIEW ARTICLE / *ПРЕГЛЕДНИ НАУЧНИ РАД*

Full Professor, Principal Research Fellow Jelena Ćeranić Perišić, LL.D.

Institute of Comparative Law, Belgrade

THE EU ARTIFICIAL INTELLIGENCE ACT: REGULATORY FRAMEWORK AND IMPLEMENTATION CHALLENGES[1]

The Artificial Intelligence Act (AI Act) entering into force on 1 August 2024, represents the European Union's first comprehensive regulatory framework governing artificial intelligence (AI). Based on a risk-based approach, the AI Act seeks to ensure that AI systems developed and applied within the European Union are safe, trustworthy, and consistent with the protection of fundamental rights. At the same time, its adoption has generated significant debate regarding its potential impact on innovation, technological development, and the competitiveness of the European Union in the global market, particularly in relation to the United States and China. Following introductory observations on the need to regulate the development and application of artificial intelligence in general, the paper examines the principal objectives and regulatory mechanisms established by the AI Act, with particular emphasis on high-risk AI systems. It then analyzes the protection of fundamental rights under the AI Act. Finally, the paper examines concerns regarding so-called overregulation under the AI Act and its possible implications for the European Union's competitiveness in the global artificial intelligence ecosystem.

Key words: Artificial Intelligence Act; European Union; Fundamental Rights; Overregulation; Competitiveness.

Jelena Ćeranić Perišić, *j.ceranic@iup.ac.rs.*

ORCID: *https://orcid.org/0000-0002-1465-510X.*

[1] This work results from research conducted within the project "Law and Sustainable Development Goals: Part One", carried out in 2026 at the Institute of Comparative Law with financial support from the Ministry of Science, Technological Development and Innovation (Contract No. 451-03-33/2026-03/200049).

1. INTRODUCTORY REMARKS

The digital age has transformed nearly every aspect of our lives. From the way we understand public authority, participate in its exercise, and influence the enjoyment of human rights and freedoms, to the ways we communicate, as well as how we deal with property and carry out various types of work, human society is facing unprecedented challenges and opportunities which, given the rapid development of technology, are believed to be almost limitless.[2]

Accelerated technological progress, particularly the increasingly widespread application of artificial intelligence (AI), represents one of the most significant challenges for contemporary legal systems. AI-based systems are now used across various domains of social life, including the economy, healthcare, education, public administration, insurance, security, and the judiciary. The use of artificial intelligence in these areas leads to fundamental changes in existing patterns of decision-making, the allocation of responsibility, and the exercise of rights. Such transformation inevitably raises the question of the adequacy of existing legal frameworks governing artificial intelligence, as well as the capacity of legal systems to respond to the challenges it generates. Moreover, the transformative nature of artificial intelligence technologies is such that it has the potential to substantially reshape various aspects of human life and, indeed, to alter reality itself and the role of humans within it.[3]

The increasing use of artificial intelligence in various spheres of life has raised the question of its impact on the well-being of individuals and groups affected by its outcomes, as well as the question of the compatibility of those outcomes with the human values on which the current moral and legal order is based.[4]

The benefits of using AI are also evidently accompanied by numerous drawbacks, which is why a parallel is often drawn with the myth of Prometheus, who stole fire from the gods and gave it to humanity, only to be severely punished. The containment of Prometheus' fire, given its vast

[2] V. Đurić, „Između inovacije i regulacije – budućnost prava u digitalnoj epohi", *Izazovi prilagođavanja pravnog okvira tehnološkim promenama u digitalnom društvu* (ur. J. Ćeranić Perišić, M. Glintić), Institut za uporedno pravo, Beograd 2025, 325–326, *https://doi.org/10.56461/ZR_25.Digi.18*.

[3] J. Ceranic Perisic, "Digital transformation: Regulation of Artificial Intelligence in the European Union", *European Integration in Times of Security Challenges* (eds. A. Kellerhals, T. Baumgartner, F. Ademi), EIZ Publishing, Zürich 2025 (2025a), 149, *https://doi.org/10.36862/eiz-784.*

[4] S. Marković, „Digitalne usluge i transparentnost algoritama", *Pravni režim digitalnih usluga u pravu Republike Srbije i pravu Evropske unije* (ur. D. Popović), Pravni fakultet Univerziteta u Beogradu, Beograd 2025, 10.

transformative potential and inherent risks, places before the legal system the task of finding a balance between these two extremes.[5]

As a technological phenomenon, artificial intelligence calls into question several foundational concepts of modern legal systems, including legal responsibility, legal personality, causation, and the relationship between automated decision-making and human autonomy. A particular difficulty arises from the fact that AI systems frequently operate as "black boxes", thereby undermining transparency, complicating the attribution of legal accountability, and potentially impairing the effective judicial protection of individual rights. Concurrently, the accelerated pace of technological development often surpasses the normative capacity of the legislator, thereby generating a regulatory gap between technological reality and existing legal frameworks.[6]

For this reason, the legal regulation of artificial intelligence stands at the intersection of diverse and often conflicting interests: market demands for innovation and competitiveness, the state's need to protect public interest and security, and the fundamental principles of the rule of law and the protection of fundamental rights. Contemporary legal systems therefore seek to establish a balance between fostering technological progress in the digital society and preventing potential misuse and harmful consequences of artificial intelligence, which are often difficult to anticipate.

In contemporary comparative law, three dominant models of regulating the development and use of artificial intelligence have emerged. The first, a market-oriented (liberal) model applied in the United States, is based on limited regulatory intervention and relies primarily on market mechanisms and dynamics. The second, a state-centric (interventionist) model, implemented in the People's Republic of China, is grounded in the strong role of the central government in regulating the development and application of artificial intelligence. The third model, developed within the European Union, is based on risk assessment and the protection of fundamental rights, and reached its normative culmination with the adoption of the Artificial Intelligence Act in 2024, as the first comprehensive legally binding regulation in this field at the global level.[7]

---

[5] M. Glintić, A. Bezbradica, „Osiguranje kao nosilac finansijske sigurnosti za upotrebu sistema veštačke inteligencije – mit ili stvarnost", *Izazovi prilagođavanja pravnog okvira tehnološkim promenama u digitalnom društvu* (ur. J. Ćeranić Perišić, M. Glintić), Institut za uporedno pravo, Beograd 2025, 166, *https://doi.org/10.56461/ZR_25.Digi.10*.

[6] J. Ćeranić Perišić, „Pravno uređenje veštačke inteligencije u savremenom pravu – između tržišta, države i prava", *Izazovi prilagođavanja pravnog okvira tehnološkim promenama u digitalnom društvu* (ur. J. Ćeranić Perišić, M. Glintić), Institut za uporedno pravo, Beograd 2025 (2025b), 12, *https://doi.org/10.56461/ZR_25.Digi.01*.

[7] *Ibid*., 12–13.

The Artificial Intelligence Act (Regulation (EU) 2024/1689)[8] entered into force on 1 August 2024. However, the EU legislature provided for a phased application of its provisions. While the majority of the Regulation's provisions become applicable on 2 August 2026, certain provisions apply earlier and others at later dates. Therefore, 2 August 2026 may be regarded as the general application date of the AI Act, but not as the date of full application of all its provisions, since specific rules remain subject to later application deadlines, including provisions that become applicable on 2 August 2027.

The AI Act represents the world's first comprehensive regulation on artificial intelligence, aiming to ensure that AI developed and used within the EU is trustworthy and includes safeguards for the protection of fundamental human rights. The regulation of AI in the EU is based on the principles of technological sovereignty and the central role of humans in the digital transformation.[9] One of the primary goals of the AI Act is to regulate the application of this technology across different sectors using a risk-based approach.

While the AI Act is perceived positively from the standpoint of promoting and protecting human rights, some academic and professional circles have expressed serious concerns that the regulation of AI within the EU may have gone too far, resulting in overregulation. There is a legitimate fear that the regulatory approach adopted by the EU may further weaken its position in the global market. The fields of AI innovation, development, and application have long been dominated by the United States and China. Therefore, with the AI Act's implementation, it appears that the EU's competitiveness may be further diminished in comparison to the positions held by the US and China.[10]

The paper examines the core objectives and regulatory mechanisms introduced by the AI Act, with particular emphasis on high-risk AI systems, and analyzes its approach to the protection of fundamental rights. It further explores whether the AI Act may be regarded as an instance of regulatory overreach and assesses its potential implications for the European Union's competitiveness in the global artificial intelligence ecosystem.

[8] 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 (AI Act), *OJ* L, 2024/1689 of 12 July 2024.

[9] J. Ceranic Perisic, (2025a).

[10] N. Bianchiani, L. Ancona, "Artificial Intelligence: Europe must start dreaming again", *Schuman Paper* 728/2023, 1–9.

2. THE PRINCIPAL OBJECTIVES AND REGULATORY MECHANISMS OF THE AI ACT

A key objective of the AI Act is to regulate the development and use of artificial intelligence through a risk-based approach that differentiates between AI systems according to their potential impact on individuals and society. The AI Act accordingly imposes graduated obligations on various actors within the AI ecosystem, reflecting the degree of risk associated with specific AI applications. Consequently, the AI Act should be viewed as a sector-neutral yet risk-oriented regulatory framework, rather than as a broad horizontal instrument comparable to the General Data Protection Regulation (GDPR).[11]

The AI Act has a very broad scope and a strong extraterritorial reach, as it applies to any AI system having an impact in the EU, regardless of the provider's place of establishment. Specifically, the AI Act would apply when the *AI system is placed on the market or put into service in the EU, when a user is located in the EU or when the output is used in the EU.*[12]

Artificial Intelligence itself is defined in very broad terms in the AI Act. It covers "any machine-based system designed to operate with varying levels of autonomy and that may exhibit adaptiveness after deployment and that, for explicit or implicit objectives, infers, from the input it receives, how to generate outputs such as predictions, content, recommendations or decisions that can influence physical or virtual environments."[13]

The regulatory framework of the AI Act differentiates between AI systems and General-Purpose AI (GPAI) models. Unlike AI systems designed for specific purposes, GPAI models are trained on extensive datasets through large-scale self-supervised learning and exhibit a significant degree of generality, enabling them to perform a diverse range of tasks and to serve as the foundation for numerous downstream applications.

The Regulation further provides for a number of exemptions from its scope of application. These exemptions encompass, *inter alia*:[14]

- AI systems and models intended exclusively for military, defence, or national security purposes;

[11] Regulation (EU) 2016/679 of the European Parliament and of the Council of 27 April 2016 on the protection of natural persons with regard to the processing of personal data and on the free movement of such data, and repealing Directive 95/46/EC, *OJ L 119 of 4 May 2016.*

[12] Art. 2 of the AI Act.

[13] Art. 3 of the AI Act.

[14] T. Samman, B. de Vanssay, "What to take away from the European law on Artificial Intelligence", *Schuman Paper* 757/2024, 2.

- AI systems and models developed and deployed solely for scientific research and development;
- activities involving the research, testing, or development of AI systems and models prior to their placement on the market or putting into service; and
- AI systems distributed under free and open-source licences, subject to the exceptions relating to prohibited AI practices and transparency obligations applicable to certain generative AI systems.

The following sections first examine the regulation of AI systems under the AI Act and then proceed to analyze the regulation of General-Purpose AI (GPAI) models.

2.1. Regulation of AI systems

At the core of the AI Act lies a risk-based regulatory model under which AI systems are classified according to the risks they may pose to health, safety, and fundamental rights. On this basis, the AI Act establishes four distinct categories of AI systems and assigns proportionate legal obligations to the relevant actors involved in their development, placement on the market, and use. The categories recognized by the AI Act are:

- prohibited AI practices;
- high-risk AI systems;
- limited-risk AI systems; and
- low- or minimal-risk AI systems.

2.1.1. Prohibited AI practices

The AI Act prohibits the placing on the market, the putting into service or the use of the following AI systems (with exceptions for certain cases):[15]

- AI systems that deploy subliminal techniques beyond a person's consciousness or purposefully manipulative or deceptive techniques;
- AI systems that exploit any of the vulnerabilities of a person or specific group of persons due to their age, disability or a specific social or economic situation;
- Biometric categorization systems that categorize individually natural persons based on their biometric data to deduce or infer some sensitive attributes;

[15] Art. 5 of the AI Act.

- AI systems for social scoring purposes;
- Use of 'real-time' remote biometric identification systems in publicly accessible spaces for the purpose of law enforcement, with some important exceptions;
- AI systems for making risk assessments of natural persons in order to asses or predict the risk of a natural person committing a criminal offence;
- AI systems that create or expand facial recognition databases through the untargeted scraping of facial images from the internet or CCTV footage;
- AI systems that infer the emotions of a natural person in situations related to the workplace and education, with some exceptions.

2.1.2. High-risk AI systems

The regulation of high-risk AI systems constitutes the central pillar of the AI Act.[16] It establishes both the criteria for identifying AI systems as high-risk and the corresponding legal obligations applicable to the various actors involved throughout the AI value chain, including providers, importers, distributors, and deployers.

The AI Act designates as high-risk those AI systems that are capable of adversely affecting health, safety, fundamental rights, the environment, democratic processes, or the rule of law. To this end, the AI Act adopts a dual classification approach.[17]

The first category encompasses AI systems that fall within existing EU product safety legislation. These include AI systems that either constitute products themselves or function as safety components of regulated products, such as medical devices, vehicles, toys, or AI-enabled surgical systems.[18]

The second category consists of AI systems expressly identified in Annex III of the Regulation. These systems are considered high-risk due to the sensitive nature of the sectors in which they are deployed and include, *inter alia*:[19]

- biometric identification and categorisation systems;
- critical infrastructure;
- education and vocational training;

[16] Art. 6 of the AI Act.

[17] T. Samman, B. de Vanssay, 3.

[18] J. Ceranic Perisic, (2025a), 158.

[19] Art. 7 of the AI Act.

- employment and workforce management;
- access to essential public and private services;
- law enforcement;
- migration, asylum, and border control management; and
- the administration of justice and democratic processes.

Notwithstanding their inclusion within these categories, the AI Act provides for a mechanism through which providers may demonstrate that a particular system does not present a level of risk sufficient to warrant classification as a high-risk AI system. This mechanism, commonly referred to as the "filter", applies exclusively to AI systems listed in Annex III of the AI Act. It does not apply to AI systems covered by Annex I, which are subject to the applicable Union product safety legislation and remain classified as high-risk where the conditions set out in Article 6(1) are fulfilled. With regard to systems falling within Annex III, the filter applies where the system does not materially influence decision-making and satisfies at least one of the conditions specified by the AI Act. These include situations in which the AI system performs a narrowly defined procedural function, enhances the outcome of a previously completed human activity, identifies patterns or anomalies without replacing human judgment, or merely supports a preparatory stage of assessment.[20]

The AI Act imposes an extensive set of requirements on high-risk AI systems.[21] These include obligations relating to risk management, data governance, technical documentation, record-keeping, transparency, human oversight, accuracy, robustness, and cybersecurity. Collectively, these requirements are intended to ensure that high-risk AI systems operate in a safe, reliable, and accountable manner throughout their lifecycle.

In addition, the AI Act establishes a comprehensive framework of obligations for the various actors participating in the AI value chain. While providers bear the primary compliance burden, importers, distributors, and deployers are likewise subject to specific duties. The AI Act further clarifies the allocation of legal responsibility among these actors, particularly in circumstances where substantial modifications to an AI system result in a change of regulatory status or compliance obligations. Providers, in particular, are required to implement quality management systems, maintain technical documentation and logs, undertake corrective measures where necessary, ensure regulatory compliance, and fulfil various information and reporting obligations.[22]

[20] T. Samman, B. de Vanssay, 3.

[21] Art. 16 of the AI Act.

[22] J. Ceranic Perisic, (2025a), 159.

2.1.3 Limited-risk AI systems

The third regulatory category encompasses AI systems that are primarily subject to transparency obligations rather than extensive *ex ante* compliance requirements. This category includes, *inter alia*, generative AI systems, emotion recognition systems, and biometric categorisation systems. The underlying rationale of these obligations is to ensure transparency, preserve informational integrity, and enable individuals to distinguish between human-generated and AI-generated content.[23]

To that end, deployers of conversational AI systems must inform users that they are interacting with an AI system. Providers of generative AI systems are further required to ensure that AI-generated outputs are identifiable through appropriate technical measures. Additional transparency obligations apply to synthetic content, including deepfakes, which must be clearly labelled as artificially generated or manipulated. Similar disclosure requirements apply to AI-generated content intended to inform the public on matters of public interest, subject to certain exceptions relating to human editorial control and responsibility.[24]

2.2. Regulation of general purposes AI models (GPAI)

The AI Act introduces a differentiated regulatory regime for General-Purpose AI (GPAI) models, structured around two levels of obligations. The first set of requirements applies to all GPAI models, whereas the second imposes additional obligations on GPAI models deemed to pose systemic risks.[25]

2.2.1. General Obligations Applicable to GPAI Models

The Regulation establishes a number of horizontal obligations for providers of GPAI models, irrespective of the specific context in which such models are subsequently deployed.[26] These obligations are intended to enhance transparency, accountability, and regulatory oversight and include:[27]

- the preparation and maintenance of comprehensive technical documentation, including information relating to the training process, testing procedures, and evaluation results;

[23] *Ibid.*
[24] T. Samman, B. de Vanssay, 4.
[25] Art. 51 of the AI Act.
[26] J. Ceranic Perisic, (2025a), 160.
[27] T. Samman, B. de Vanssay, 4–5.

- the provision of relevant documentation and instructions to downstream providers integrating GPAI models into their own AI systems, including information concerning the model's capabilities and limitations;
- the adoption of policies designed to ensure compliance with EU copyright law; and
- the publication of a sufficiently detailed summary of the data and content used for training the model.

The AI Act nevertheless provides for certain exemptions in relation to open-source GPAI models. In particular, providers of non-systemic open-source models are exempt from selected documentation obligations. However, the AI Act adopts a relatively narrow understanding of open-source models, limiting this status to models released under licences that permit access, use, modification, and redistribution, while also making publicly available the model's parameters, weights, architecture, and usage information.[28]

2.2.2. Additional Obligations for GPAI Models with Systemic Risk

Beyond the general obligations applicable to all GPAI models, the AI Act establishes a stricter regulatory regime for GPAI models that present systemic risks. These models are characterized by their high-impact capabilities and are generally understood to encompass the most advanced and powerful AI models currently available.

Providers of such models are subject to enhanced compliance requirements, including obligations to:[29]

- conduct model evaluations using standardized methodologies, protocols, and testing tools;
- identify, assess, and mitigate systemic risks that may arise at the level of the European Union;
- report serious incidents and the corrective measures adopted in response to such incidents to the European Commission and relevant national authorities; and
- implement and maintain an appropriate level of cybersecurity protection.

Through this two-tier framework, the AI Act seeks to balance the promotion of innovation in the field of general-purpose AI with the need to

[28] *Ibid*., 5.

[29] Art. 55 of the AI Act.

address the heightened risks associated with the most capable and widely deployable AI models.

3. PROTECTION OF FUNDAMENTAL RIGHTS UNDER THE AI ACT

The protection of fundamental rights and human dignity lies at the core of the European approach to the regulation of AI. Automated decision-making, algorithmic profiling, and large-scale data processing are viewed as potential sources of risks to individual rights and freedoms, and are therefore subject to strict substantive and procedural safeguards.

The EU regulatory framework places particular emphasis on transparency, explainability, human oversight, and access to effective legal remedies. In this way, artificial intelligence is integrated into the existing framework of fundamental rights protection and the rule of law, rather than being treated merely as a technical or market-related issue.[30]

Article 1 of the AI Act provides that the purpose of the Regulation is to improve the functioning of the internal market while promoting the uptake of human-centric and trustworthy AI.[31] At the same time, the AI Act seeks to ensure a high level of protection of health, safety, and fundamental rights as enshrined in the Charter of Fundamental Rights of the European Union, including democracy, the rule of law, and environmental protection from the harmful effects of AI systems within the Union, while also fostering innovation.[32]

Furthermore, the AI Act expressly acknowledges the importance of international human rights instruments, including the United Nations Convention on the Rights of Persons with Disabilities, the United Nations Convention Relating to the Status of Refugees, the United Nations Convention on the Rights of the Child, and General Comment No. 25 on children's rights in relation to the digital environment. In addition to these instruments from the United Nations human rights framework, the AI Act also places significant emphasis on the EU legal order, requiring compliance with the provisions of the Treaties of the European Union, the Charter of Fundamental Rights, and relevant secondary EU legislation. With regard to the prohibition of discrimination, the AI Act explicitly provides that it shall not affect practices prohibited under the EU law, including

[30] J. Ćeranić Perišić, (2025b), 22.

[31] Art. 1 of the AI Act.

[32] V. Korać, D. Prlja, G. Gasmi, "European Approach to Artificial Intelligence", *Archaeology and Science* 19/2023, 209–216, *https://doi.org/10.18485/arhe_apn.-2023.19.14*.

legislation relating to data protection, non-discrimination, consumer protection, and competition law.[33]

The extensive references to international and European human rights instruments throughout the AI Act reflect the fact that all EU Member States are parties to the European Convention on Human Rights, as well as to the principal United Nations human rights treaties. Consequently, the AI Act serves as a reminder that its provisions must be interpreted and applied consistently with the existing international and European human rights framework. In the development, deployment, and governance of artificial intelligence, Member States are therefore required to ensure compliance not only with the AI Act itself, but also with the broader system of human rights protection established under United Nations instruments, the European Convention on Human Rights, and other relevant components of the European supranational human rights architecture.[34]

4. OVERREGULATION CONCERNS AND THE EU'S GLOBAL COMPETITIVENESS

While the AI Act is generally regarded as a significant step forward in the protection of fundamental rights and the establishment of a harmonised regulatory framework for AI within the European Union, parts of the academic and professional literature have raised concerns that the Union may have adopted an overly stringent regulatory approach, potentially resulting in regulatory overreach. In this context, it has been argued that the cumulative effect of compliance obligations, particularly for providers of general-purpose and high-risk AI systems, may impose significant regulatory burdens that could affect innovation capacity and market dynamics within the EU.[35]

Against this background, it is further suggested that the implementation of the AI Act may have implications for the Union's position in the global AI ecosystem. The United States and China are widely regarded as global leaders in AI innovation, development, and large-scale deployment, benefiting from strong private investment, extensive access to data, and highly integrated technological ecosystems. In comparison, the EU is often characterised as operating within a more fragmented regulatory and market

[33] Recital 45 of the AI Act.

[34] J. Ćeranić Perišić, S. Mišan, „Akt o veštačkoj inteligenciji Evropske unije i savremeni izazovi u ostvarivanju i zaštiti ljudskih prava", *Međunarodni naučni skup Savremeni izazovi u ostvarivanju i zaštiti ljudskih prava* (ur. B. Bojanić), Pravni fakultet Univerziteta u Prištini sa privremenim sedištem u Kosovskoj Mitrovici, Institut za kriminološka i sociološka istraživanja, Institut za uporedno pravo, Kosovska Mitrovica 2025, 29.

[35] N. Bianchiani, L. Ancona.

environment, which may limit the scalability of AI solutions developed within its jurisdiction.[36]

Accordingly, some scholars argue that the enforcement of the AI Act, while normatively justified from the perspective of fundamental rights protection, could nevertheless reinforce existing structural disadvantages and thereby further challenge the EU's relative competitiveness in comparison with these leading jurisdictions.[37]

A number of structural and systemic factors are commonly identified in the literature as contributing to the EU's comparatively weaker position in the field of AI. These include the fragmentation of the digital single market,[38] regulatory heterogeneity across Member States in adjacent policy areas, limited availability of large-scale and high-quality datasets,[39] comparatively lower levels of venture capital investment in deep-tech sectors, and the outflow of highly skilled professionals to third countries,[40] especially the United States.[41] In addition, some analyses point to the absence of a fully integrated and coordinated European innovation ecosystem capable of effectively translating research outputs into scalable industrial applications.[42]

In response to these challenges, a range of policy measures have been proposed in order to strengthen the EU's position in the global AI landscape. These include the further development of a Common European Data Space,[43] enhanced and sustained funding for artificial intelligence research and innovation under EU-level programmes, the strengthening of cross-border innovation ecosystems and public–private partnerships, as well as the potential establishment of specialised European centres for artificial intelligence research, development, and deployment aimed at consolidating expertise and improving technological competitiveness.[44]

---

[36] *Ibid*.

[37] *Ibid.*

[38] What is holding back artificial intelligence adoption in Europe?, *https://www.bruegel.org/policy-brief/what-holding-back-artificial-intelligence-adoption-europe,* 10 June 2026.

[39] The world's most valuable resource is no longer oil, but data, *https://www.economist.com/leaders/2017/05/06/the-worlds-most-valuable-resource-is-no-longer-oil-but-data*, 10 June 2026.

[40] The Global AI Talent Tracker 2.0, *https://macropolo.org/digital-projects/the-global-ai-talent-tracker/,* 10 June 2026.

[41] One third of AI talent from American universities come from the EU (N. Bianchiani, L. Ancona, 6).

[42] J. Ceranic Perisic (2025a), 150–154.

[43] Common European Data Base, *https://dataspaces.info/common-european-data-spaces/#page-content*, 10. jun 2026.

[44] N. Bianchiani, L. Ancona.

5. CONCLUSION

The Artificial Intelligence Act constitutes a foundational milestone in the European Union's regulatory approach to AI, establishing the first comprehensive, risk-based legal framework in this domain at the global level. From a normative perspective, the AI Act reflects a coherent attempt to embed artificial intelligence within the Union's constitutional values, in particular through the prioritisation of transparency, accountability, human oversight, and the safeguarding of fundamental rights. In this sense, the AI Act may be regarded as a decisive step towards the consolidation of a human-centric model of technological governance, grounded in the principles of legal certainty and the rule of law.[45]

However, the comprehensive and highly detailed nature of the regulatory framework has also generated sustained debate regarding its potential systemic effects on innovation and market dynamics. A significant strand of academic commentary has pointed to the risk that the cumulative compliance obligations imposed on providers, particularly in relation to high-risk and general-purpose AI systems, may result in regulatory overreach. In this regard, it is argued that the intensity of regulatory intervention could impose structural constraints on innovation capacity, increase market entry barriers, and affect the overall competitiveness of the European AI industry.

These concerns are further amplified when situated within the broader geopolitical and economic context of artificial intelligence development. Compared to the United States and China,[46] which benefit from highly integrated innovation ecosystems, substantial investment capacities, and extensive data infrastructures, the EU continues to operate within a comparatively fragmented regulatory and market environment. Against this background, it remains an open question whether the EU's regulatory leadership will translate into technological leadership, or whether it may, in certain respects, contribute to a relative competitive disadvantage in global AI markets.

Ultimately, the analysis suggests that the AI Act should be regarded as a necessary and, in principle, justified regulatory response to the risks associated with artificial intelligence. At the same time, however, its comprehensive and demanding regulatory approach creates a genuine risk of overregulation if compliance requirements are applied in a manner that unnecessarily constrains technological development and market access. The objective should therefore not be to choose between regulation and

[45] J. Ćeranić Perišić, (2025b), 20.

[46] J. Ćeranić Perišić, (2025b), 16–19.

innovation, but to ensure that regulation remains proportionate to the risks it seeks to address. In this respect, the long-term effectiveness of the AI Act will depend not only on the protection of fundamental rights and the enforcement of regulatory standards, but also on the EU's ability to preserve an environment conducive to innovation and technological competitiveness. The central challenge for the European Union will thus be to maintain a dynamic balance between effective protection against the risks of AI and the regulatory flexibility necessary for the development of a competitive European AI ecosystem.

LIST OF REFERENCES

Scientific works

1. Bianchiani Niccolo, Ancona Lorenzo, "Artificial Intelligence: Europe must start dreaming again", *Schuman Paper* 728/2023;
2. Ceranic Perisic, Jelena, "Digital transformation: Regulation of Artificial Intelligence in the European Union", *European Integration in Times of Security Challenges* (eds. A. Kellerhals, T. Baumgartner, F. Ademi), EIZ Publishing, Zürich 2025, *https://doi.org/10.36862/eiz-784*;
3. Ćeranić Perišić, „Pravno uređenje veštačke inteligencije u savremenom pravu – između tržišta, države i prava", *Izazovi prilagođavanja pravnog okvira tehnološkim promenama u digitalnom društvu* (ur. J. Ćeranić Perišić, M. Glintić), Institut za uporedno pravo, Beograd 2025 (2025b), *https://doi.org/10.56461/ZR_25.Digi.01*;
4. Ćeranić Perišić, Jelena, Mišan, Sanja, „Akt o veštačkoj inteligenciji Evropske unije i savremeni izazovi u ostvarivanju i zaštiti ljudskih prava", *Međunarodni naučni skup Savremeni izazovi u ostvarivanju i zaštiti ljudskih prava* (ur. B. Bojanić), Pravni fakultet Univerziteta u Prištini sa privremenim sedištem u Kosovskoj Mitrovici, Institut za kriminološka i sociološka istraživanja, Institut za uporedno pravo, Kosovska Mitrovica 2025;
5. Đurić, Vladimir, „Između inovacije i regulacije – budućnost prava u digitalnoj epohi", *Izazovi prilagođavanja pravnog okvira tehnološkim promenama u digitalnom društvu* (ur. J. Ćeranić Perišić, M. Glintić), Institut za uporedno pravo, Beograd 2025, *https://doi.org/10.56461-/ZR_25.Digi.18*;
6. Glintić, Mirjana, Bezbradica, Anja, „Osiguranje kao nosilac finansijske sigurnosti za upotrebu sistema veštačke inteligencije – mit ili stvarnost", *Izazovi prilagođavanja pravnog okvira tehnološkim promenama u digitalnom društvu* (ur. J. Ćeranić Perišić, M. Glintić), Institut za uporedno pravo, Beograd 2025, *https://doi.org/10.56461/ZR_25.Digi.10*;
7. Korać, Vanja, Prlja, Draga, Gasmi, Gordana "European Approach to Artificial Intelligence", *Archaeology and Science* 19/2023, *https://doi.org/-10.18485/arhe_apn.2023.19.14*;

8. Marković, Slobodan, „Digitalne usluge i transparentnost algoritama", *Pravni režim digitalnih usluga u pravu Republike Srbije i pravu Evropske unije* (ur. D. Popović), Pravni fakultet Univerziteta u Beogradu, Beograd 2025;
9. Samman, Thaima, de Vanssay, Benjam, "What to take away from the European law on Artificial Intelligence", *Schuman Paper* 757/2024.

Legal documents

1. 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), *OJ* L, 2024/1689 of 12 July 2024;
2. Regulation (EU) 2016/679 of the European Parliament and of the Council of 27 April 2016 on the protection of natural persons with regard to the processing of personal data and on the free movement of such data, and repealing Directive 95/46/EC, *OJ* L 119 of 4 May 2016.

Internet sources

1. Common European Data Base, *https://dataspaces.info/common-european-data-spaces/#page-content*, 10 June 2026;
2. What is holding back artificial intelligence adoption in Europe?, *https://www.bruegel.org/policy-brief/what-holding-back-artificial-intelligence-adoption-europe*, 10 June 2026;
3. The Global AI Talent Tracker 2.0, *https://macropolo.org/digital-projects/the-global-ai-talent-tracker/*, 10 June 2026;
4. The world's most valuable resource is no longer oil, but data, *https://www.economist.com/leaders/2017/05/06/the-worlds-most-valuable-resource-is-no-longer-oil-but-data*, 10 June 2026.

J. Ćeranić Perišić, *The EU Artificial Intelligence Act: Regulatory Framework and Implementation Challenges*, Collection of Papers "Law: cause or effect", East Sarajevo 2026, pp. 335–351.

Проф. др Јелена Ћеранић Перишић,
Редовни професор, научни саветник
Институт за упоредно право, Београд

АКТ О ВЕШТАЧКОЈ ИНТЕЛИГЕНЦИЈИ ЕВРОПСКЕ УНИЈЕ: РЕГУЛАТОРНИ ОКВИР И ИЗАЗОВИ ИМПЛЕМЕНТАЦИЈЕ

Сажетак

Акт о вештачкој интелигенцији (Акт ВИ) ступио је на снагу 1. августа 2024. и представља први свеобухватни регулаторни оквир Европске уније којим се уређује вештачка интелигенција (ВИ). Заснован на приступу који почива на процени ризика, Акт ВИ има за циљ да обезбеди да системи вештачке интелигенције који се развијају и примењују у ЕУ буду безбедни, поуздани и усклађени са заштитом основних права. Истовремено, његово усвајање изазвало је озбиљну дискусију у погледу потенцијалног утицаја на иновације, технолошки развој и конкурентност ЕУ на глобалном тржишту, нарочито у односу на Сједињене Америчке Државе и Народну Републику Кину. Након уводних разматрања о потреби регулисања развоја и примене вештачке интелигенције уопште, рад испитује основне циљеве и регулаторне механизме успостављене Актом ВИ, са посебним освртом на високоризичне системе вештачке интелигенције. Након тога, анализира начин на који је обезбеђена заштита основних права у оквиру Акта ВИ. Напослетку, рад разматра да ли приступ тзв. прекомерног регулисања, за који се ЕУ определила приликом израде Акта ВИ, може имати импликације на конкурентност Уније у глобалном екосистему вештачке интелигенције.

Кључне речи: *Акт о вештачкој интелигенцији; Европска унија; Основна права; Прекомерно регулисање; Конкурентност.*

CIP - Каталогизација у публикацији
Народна и универзитетска библиотека
Републике Српске, Бања Лука

34(082)

НАУЧНИ скуп "Право: узрок или посљедица" (14 ; 2025 ; Пале)
Зборник радова "Право: узрок или посљедица". Том III = Collection of Paper "Law: cause or effect". Vol. III : XIV Научни скуп поводом Дана Правног факултета, Међународни научни скуп одржан 25. октобра 2025. год. на Палама / [оргнизатор] Правни факултет Универзитета у Источном Сарајеву ; [суорганизатори] Европска организација за јавно право... [и др.] ; [коуредници Димитрије Ћеранић ... [и др.]]. - Источно Сарајево : Правни факултет, 2026 (Лакташи : Графомарк). - 547 стр. ; 25 cm

Текст ћир. и лат. - Радови на срп., енгл. и франц. језику. - Тираж 65. - Напомене и библиографске референце уз текст. - Библиографија уз сваки рад. - Summaries.

ISBN 978-99997-47-08-0

COBISS.RS-ID 144883201