Exporting European Values?

Technical Standardization, the Achilles Heel of the EU's Artificial Intelligence Act

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The EU aims to create a "Brussels Effect" in the field of AI: Through its market power it can incentivize companies to adhere to the proposed AI Act globally. However, the AI Act's reliance on standard development bodies to operationalize its rules may enable other jurisdictions to shape AI in the EU.

I. Introduction

Lawmakers in the European Union view the regulation of technology not only as a way to govern EU-based individuals and companies, but also as a means of exporting European values to third countries. Outlining a vision of her future presidency, then-candidate *Ursula von der Leyen* stated that "[t]rade is not an end in itself. It is a means to deliver prosperity at home and to export our values across the world"[1]. Rather than a purely altruistic endeavor, exporting European values, such as respect for human rights and democracy, is a strategy to promote digital sovereignty.[2] By imprinting European values on global technology markets, the EU can potentially prevent the domination and imposition of conflicting values and rules encoded in digital technologies imported from third countries, which can undermine the rights and interests of EU citizens and companies.

Such an export of values can be achieved through cooperation, coercion, or market mechanisms.[3] The EU has proven capable of setting global standards in various fields, especially in digital technology regulation. Famously, the Court of Justice of the EU found data subjects' "right to be forgotten" as established in the Data Protection Directive (DPD) binding for Google Inc., a United States company,[4] while the General Data Protection Regulation (GDPR) leads to such territorial extension[5] by being applicable to entities targeting or monitoring data subjects in the EU.[6] In these cases, the extraterritoriality of EU law exists de jure. However, the GDPR also has a de facto influence on foreign companies' data protection practices in other jurisdictions. *Anu Bradford* calls this the "Brussels Effect"[7]: Employing a single regulatory compliance strategy in all jurisdictions, even when it is based on the GDPR's relatively stringent standards, is often less costly than

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1 *Von der Leyen*, A Union that strives for more: My agenda for Europe, 2019, p. 17.
2 See e.g. Treaty on the European Union, Art. 2.
3 *Bradford*, Int. Rev. Law Econ. 42 (2015), 158 (159).
4 CJEU, C-131/12, ECLI:EU:C:2014:317 – Google Spain SL v. Agencia Española de Protección de Datos, paras. 55-56.
5 *Scott*, AM. J. COMP. L. 62 (2014), 87.
6 *Ryngaert/Taylor*, AJIL 114 (2020), 5 (6); see also Gstrein/Zwitter, Internet Policy Rev 10 (2021), 1 (7 et sq.).
7 *Bradford*, Nw. U. L. R., 2012, 1; Bradford, Int. Rev. Law Econ. 42 (2015), 158-173; Bradford, The Brussels Effect, 2020.

employing a multiplicity of compliance strategies in jurisdictions with more lenient standards. This not only protects EU citizens and levels the playing field for EU businesses that would otherwise be at a competitive disadvantage, but also helps the EU to project geopolitical power.[8] Exporting values via market mechanisms is a particularly attractive policy strategy. It is less costly than sanctions, and, unlike international treaties, does not require another jurisdiction's explicit consent.[9]

A desire to replicate the GDPR's Brussels Effect is apparent in the EU's proposed Artificial Intelligence Act (Draft AI Act).[10] According to the European Commission, the proposal "significantly strengthens the Union's role to help shape global norms and standards and promote trustworthy AI that is consistent with Union values and interests. It provides the Union with a powerful basis to engage further with its external partners, including third countries… on issues relating to AI."[11] The Commission assumes the market power behind an EU-level AI regulation will enable the EU to "protect Europe's sovereignty and leverage its tools and regulatory powers to shape global rules and standards"[12].

Will it, though? EU policymakers are motivated not by a desire to assert extraterritorial regulatory control for its own sake, but rather to use regulation as a tool to influence the behavior and norms of third countries to make them amenable to EU goals and interests. While the AI Act may produce a Brussels effect on the regulatory level, it may have an Achilles heel that precludes the export of values: The European standardization system, an integral part of the New Legislative Framework (NLF)[13].

The NLF is the regulatory regime that will govern AI systems posing a high risk to human health, safety, or fundamental rights in the AI Act (Title III of the Draft AI Act).[14] As NLF legislation, the AI Act requires assessments of an AI system's compliance or conformity with the law's *essential requirements*, which are broadly worded rules for the protection of public interests. Essential requirements are translated into technical specifications for particular products through a complex process involving the European Commission, European technical standard-setting bodies, and other stakeholders. This process is intended to allocate political decisions to public bodies and narrow technical decisions to standard-setting bodies. However, in practice standard-setting bodies can exercise decision-making power about fundamental rights that produce standards inconsistent with essential requirements, which in the AI Act include fundamental rights protections.

This article will analyze the likelihood that the AI Act will produce a Brussels Effect, both on the regulatory level and the values level. This article therefore proceeds as follows. Section II briefly outlines the *occasio legis* and the *ratio legis* of the Draft AI Act. Section III introduces the conditions for unilateral regulatory globalization according to *Bradford* and analyzes whether the Draft AI Act might meet them. Section IV discusses how European standardization impedes a potential Brussels Effect by undermining fundamental rights and democracy[15]. Finally, the conclusion summarizes these arguments and briefly outlines potential strategies to produce a Brussels Effect in the AI industry.

II. The Draft Artificial Intelligence Act

For the purpose of the AI Act, Artificial Intelligence (AI) is defined as "software that is developed with one or more of the techniques and approaches listed in Annex I and can, for a given set of human-defined objectives, generate outputs such as content, predictions, recommendations, or decisions influencing the environments they interact with", Art. 3 pt. 1. The techniques and approaches referred to are machine learning approaches, logic- and knowledge-based approaches, and statistical approaches.

As a general-purpose technology with the potential of future capabilities far exceeding those of humans, AI has the potential to radically transform individual lives and societies.[16] It poses tremendous opportunities, e.g. for improving health, wealth, sustainability, science, and self-understanding, as well as enormous risks, ranging from increasing economic inequality to an erosion of values and the enabling of robust totalitarianism.[17]

The Draft AI Act is one of the first comprehensive proposals to specifically regulate AI systems.[18] This in itself is remarkable as EU technology regulation has so far predominantly been technology-neutral,[19] arguing that "[r]egulation that is based on specific technology can quickly become outdated, and may lead to inefficient investment by market players"[20]. The proposal is based on a governance frame-

8 *Bradford* (Fn. 7), p. 39.

9 *Bradford*, Int. Rev. Law Econ. 42 (2015), 158 (159).

10 Proposal for a regulation laying down harmonised rules on artificial intelligence by the European Commission of 21 April 2021, COM(2021) 206.

11 Draft AI Act, Explanatory Memorandum, section 1.3.

12 Draft AI Act, Explanatory Memorandum, section 2.2.

13 The NLF consists of Regulation (EC) 765/2008 setting out the requirements for accreditation and market surveillance relating to the marketing of products, Decision 768/2008 on a common framework for the marketing of products, and Regulation (EU) 2019/1020 on market surveillance and compliance of products.

14 *Veale/Zuiderveen Borgesius*, Comput. Law Rev. Int. 2021, 97 (102).

15 European Commission, An EU Strategy on Standardisation. Setting global standards in support of a resilient, green and digital EU single market, COM(2022) 31 final.

16 *Bostrom/Dafoe/Flynn*, in: Liao (ed.), Ethics of Artificial Intelligence, 2020, pp. 293 et sq.

17 *Bostrom/Dafoe/Flynn* (Fn. 15), pp. 293 et sq.; Dafoe, AI Governance: A Research Agenda, 2018, pp. 7 et sq.

18 For an overview on policy approaches see Law Library of Congress, Regulation of Artificial Intelligence in Selected Jurisdictions, 2019.

19 *Reed*, SCRIPT-ed 4 (2007), 264 with further references; see also *Dahlhaus/Schrader/Breuer/Lindner*, Statement on the White Paper on Artificial Intelligence – A European approach to excellence and trust, COM(2020) 65 final, 14/06/2020, pp. 8 et sq.

20 European Commission, Towards a new framework for Electronic Communications infrastructure and associated services, COM(1999) 539, p. 14; ; on the problems of AI-specific regulation and of a legal definition of Artificial Intelligence, see: *Reed*, Philos. Trans. R. Soc. A, 376 (2018), 1 (2); *Buiten*, Eur. J. Risk Regul. (2019), 41 (45); *Stone et al.*, Artificial Intelligence and Life in 2030. One Hundred Year Study on Artificial Intelligence, 2016, p. 48.

work laid out in the European Commission's 2020 White Paper on Artificial Intelligence.[21] The framework is not only intended to counteract emerging divergent national AI regulation that could fragment the internal market, but also to promote the EU's digital sovereignty and "technological leadership" on a global level[22]. In order to achieve these goals, the future AI Act is intended to provide a high degree of protection against the risks AI poses to fundamental rights, health, and safety, and also boost the EU's industrial competitiveness in the field.[23]

III. The Draft Artificial Intelligence Act's Potential for Regulatory Globalization

To determine whether the AI Act will produce a Brussels Effect, it is useful to turn to *Bradford's* foundational work on the phenomenon. She defines the Brussels Effect as a form of "[u]nilateral regulatory globalization [that] takes place when a single state [or jurisdiction] is able to externalize its laws and regulations outside its borders through market mechanisms, resulting in the globalization of standards".[24] Though other jurisdictions can achieve this outcome, the term Brussels Effect refers to the EU's exceptional ability to do so. This externalization occurs when foreign market participants conform to EU regulatory standards because they depend on access to the European Single Market, and also opt to adhere to strict EU requirements globally to reduce regulatory compliance costs.

According to *Bradford*, there are several conditions for unilateral regulatory globalization:

market power, i.e. the "relative size of any given country's internal market"[25],

inelastic targets, i.e. market actors showing low sensitivity in the face of ramped up regulatory pressure,

non-divisibility of standards, i.e. the situation when a "production or conduct is non-divisible across different markets or when the benefits of a uniform standard due to scale economics exceed the costs of forgoing lower production costs in less regulated markets"[26],

regulatory capacity, i.e. the "ability to promulgate and enforce regulations"[27], and

strict regulatory standards[28].

While the European Commission has argued that being the first jurisdiction to regulate AI comprehensively will in itself produce a Brussels Effect through a *first-mover advantage*, *Bradford's* logic suggests otherwise.[29] The AI Act's standards would merely prevail until another regulator's jurisdiction meets *Bradford's* conditions for unilateral regulatory globalization, such as stricter standards. In that case, companies would be incentivized to adhere to the second jurisdiction's stricter standards in order to access both the more strictly regulated market and the EU market. As a first mover, the EU could aim to establish a blueprint serving as an example for other regulators, or impose its policy, e.g. via sanctions. This would, however, either require willing adoption or coercion, both different from utilizing market mechanisms to incentivize market participants.

1. Market Power

The Brussels Effect is only possible where the EU's market power, meaning the relative size of its internal market, is sufficiently great.[30] A market actor is more likely to adhere to EU standards to gain access to the internal market if it is relatively large compared to the actor's home or third country markets, and if the costs of adjusting products or practices to meet EU standards is relatively low.[31]

In certain industries, the EU's market power has not been sufficient to incentivize producers and providers to take on adjustments costs resulting in them forgoing the European market, resulting in a "Brussels Firewall"[32]. In the field of AI in general, however, fears of a Brussels Firewall[33] that might only allow less innovative offerings into the internal market while limiting global competitiveness of EU solutions are so far rare.

The global market for AI amounted to 341.8 bn. U.S. dollars in 2021 and is expected to grow to 554.3 bn. U.S. dollars by 2024.[34] In Europe, the AI market is expected to grow far more rapidly from 3.9 bn. U.S. dollars in 2021 to 14.4 bn. by 2024.[35] For AI software alone, Europe's market share

21 European Commission, White Paper on Artificial Intelligence – A European approach to excellence and trust, COM(2020) 65 final.

22 Draft AI Act, Explanatory Memorandum, sections 1.1 and 2.2; European Commission, White Paper on Artificial Intelligence – A European approach to excellence and trust, COM(2020) 65 final, pp. 2, 7.

23 Draft AI Act, Explanatory Memorandum, sections 1.1 and 2.2; Recital 13.

24 *Bradford* (Fn. 7), p. 3.

25 *Bradford*, Int. Rev. Law Econ. 42 (2015), 158 (161).

26 *Bradford*, Int. Rev. Law Econ. 42 (2015), 158 (163, see also 164-165).

27 *Bradford* (Fn. 7), pp. 30 et sq.

28 *Bradford*, Int. Rev. Law Econ. 42 (2015), 158 (162-163).

29 *European Commission*, The annual Union work programme for European standardisation, COM(2019) 486 final, p. 1; Commissioner for the Internal Market, Industry, Entrepreneurship and SMEs Elżbieta Bieńkowska, quoted by European Commission, Press release: Commission acts to make standardisation in the Single Market more efficient, 22/11/2018, p. 1; see also *Bertuzzi/Noyan*, Commission yearns for setting the global standard on artificial intelligence, 15/09/2021, https://www.euractiv.com/section/digital/news/commission-yearns-for-setting-the-global-standard-on-artificial-intelligence/ (last visited: 15/03/2022).

30 *Bradford* (Fn. 7), p. 11.

31 *Bradford* (Fn. 7), pp. 11-12; Bradford, Int. Rev. Law Econ. 42 (2015), 158 (161).

32 *Bildt/Mann/Vos*, The Brussels Effect – the EU's Digital Strategy Goes Global, Covington Alert, 27/02/2020, https://www.cov.com/en/news-and-insights/insights/2020/02/the-brussels-effect-the-eus-digital-strategy-goes-global (last visited: 15/03/2022).

33 See, for example: *Bildt/Mann/Vos* (Fn. 31); Center for Data Innovation, Response to the European Commission's Consultation on the White Paper on Artificial Intelligence, 14/06/2020, https://www2.datainnovation.org/2020-eu-ai-whitepaper-response.pdf (last visited: 15/03/2022), p. 12.

34 Statista, Artificial intelligence (AI) market revenues worldwide in 2020 and forecasts from 2021 to 2024, 24/09/2021, https://www.statista.com/statistics/694638/worldwide-cognitive-and-artificial-intelligence-revenues/ (last visited: 15/03/2022).

35 Statista, Revenues from the artificial intelligence market in Europe, from 2016 to 2025, 25/11/2019, https://www.statista.com/statistics/721749/europe-artificial-intelligence-market/ (last

will grow from 7,8 % in 2021 to 26,5 % by 2024.[36] It seems unlikely that the few European tech companies will be able to meet the EU's potential future demand for AI-enabled services and products, hence leaving market openings for imports.[37] To gain access to these markets, exporters will have to comply with EU AI regulation.

2. Inelastic Targets

Another condition of the Brussels Effect is that regulatory measures are directed at inelastic targets. A market is inelastic, when market actors exhibit low sensitivity in the face of increased regulatory intensity.[38] Thus, inelasticity translates to the inability of market actors to circumvent regulation.

Stringent regulations of elastic targets, such as taxes on financial transactions, can be avoided by relocating a company to a more lenient jurisdiction.[39] In contrast, the proposed AI legislation will apply to most[40] AI systems that are placed on the market or put into service in the Union or if their output is used in the Union, Art. 2(1) Draft AI Act. The regulation, therefore, targets not only rather elastic business markets but also highly inelastic consumer, government, and institutional markets. While EU member states' governments or institutions such as hospitals or schools cannot move outside the borders of EU jurisdiction, consumers are at least highly unlikely to move to another jurisdiction. This limits the markets' capability to punish strict legislation.[41]

3. Non-Divisibility of Standards

While a substantial import market size and inelastic regulatory targets help to ensure that foreign companies will develop AI-enabled products and services that comply with EU regulation for the internal market, companies will only apply EU standards globally if it is technically, legally, or economically unfeasible to develop or adapt different versions of products and services for different jurisdictions and markets.[42] Because the definition of AI in Art. 3 pt. 1 covers features of most software, it is not possible to categorically state that AI standards in general are technically, legally, or economically non-divisible.[43] The likelihood of non-divisibility varies by context.

There will likely be AI programs designed to be used only in specific jurisdictions outside of the EU, such as systems intended to be used by public authorities to evaluate the eligibility for public assistance benefits and services. These would not need to comply with EU regulations, and applicable local regulations may in fact conflict with EU regulation. In this case, a provider would have no other choice but to develop different versions for different jurisdictions. This category of programs would therefore be legally divisible.

On the other hand, standards for programs that could potentially be used in the EU – even if not intentionally marketed in the EU – may be legally non-divisible. Article 2(1)(c) of the AI Act states that its rules apply to providers of systems whose output is used in the EU. This contrasts with Article 2(1)(a), which states that the AI Act applies to providers who place on the market or put into service AI systems in the EU. Unlike Article 2(1)(a), Article 2(1)(c) does not condition applicability upon the intention of the provider to market their product in the EU. Article 2(1)(c) does not even establish the requirement that the use of the system's output in the EU has to be foreseeable for providers or users located outside the EU. Recital 11 confirms the possibility of this scenario, stating that "certain AI systems should fall within the scope of this Regulation even when they are neither placed on the market, nor put into service, nor used in the Union". This suggests that any product produced by a provider in a third country whose output could potentially be used in the EU would need to preemptively comply with the AI Act, making its standards legally non-divisible.

There may also be technical difficulties, e.g. for providers of AI systems that require training of models with data: The GDPR revealed the technical non-divisibility of data privacy standards as it poses technical challenges for companies to determine whether a data subject is in fact a European data subject.[44] There are, however, efforts to transition to federated learning, which would enable tech companies to train AI models without transferring data from users' devices to the cloud[45] and allow companies to adhere to different data privacy standards. This does not appear to be the industry norm yet, though. As long as providers have to adhere to a single global standard in the context of data collection and processing for training such an AI system either way, they are more likely to adhere to the further requirements of the

visited: 15/03/2022).

36 Statista, Revenues from the artificial intelligence software market worldwide from 2018 to 2025, by region, 24 September 2020, https://www.statista.com/statistics/721747/worldwide-artificial-intelligence-market-by-region/ (last visited: 15/03/2022).

37 *Wolff*, Europe may be the world's AI referee, but referees don't win. The EU needs to invest in homegrown technology, in: Politico, 17/02/2020, https://www.politico.eu/article/europe-may-be-the-worlds-ai-referee-but-referees-dont-win-margrethe-vestager/ (last visited: 15/03/2022): "about 45 percent of AI-related patent filings made in the U.S., and another 40 perent (sic!) in China… Four U.S. firms capture about a quarter of the worldwide AI market. The EU offering is comparatively poor. Of the top 30 AI-related patent applicants, only four are European. Nor is the future looking more promising. Of the 100 most promising AI startups in the world, only two are from the EU (while six are from the U.K.), and they attract well-below-average funding" with further references.

38 See *Bondarenko*, "elasticity", in: Encyclopaedia Britannica, https://www.britannica.com/topic/elasticity-economics (last visited: 15/03/2022).

39 *Bradford*, Int. Rev. Law Econ. 42 (2015), 158 (163).

40 The AI Act would not directly apply to certain AI systems that are safety components, products, or systems falling within the scope of certain regulations listed in Article 2(2) Draft AI Act, particularly in the fields of civil aviation, marine equipment, and rail systems as well as certain vehicles. It would further not apply to AI systems developed or used exclusively for military purposes, Article 2(3).

41 *Bradford*, Int. Rev. Law Econ. 42 (2015), 158 (163).

42 *Bradford*, Int. Rev. Law Econ. 42 (2015), 158 (163 et sq.).

43 *Veale/Zuiderveen Borgesius*, Comput. Law Rev. Int. (2021), 97 (109).

44 *Bradford* (Fn. 7), p. 57.

45 *Truong et al.*, Computers & Security 110 (2021), 1 et sq.; *Hartmann*, Predicting Text Selections with Federated Learning, in: Google AI Blog, 22/11/2021, https://ai.googleblog.com/2021/11/predicting-text-selections-with.html (last visited: 15/03/2022).

AI Act, as well.

Even if it is technically possible to offer different versions of an AI system for EU- and third country-markets, the benefits associated with economics of scale might incentivize companies to adhere to the stricter standard which would allow them to design and develop a single AI system that can be marketed globally.[46] While doing so, companies can also enhance their brands' value by increasing consumer confidence by sending the message that they do not take their non-EU customers' fundamental rights any less seriously.[47]

4. Regulatory Capacity

Incentivizing compliance with the AI Act further requires institutional structures capable of producing and enforcing these regulations effectively.[48] These include regulatory expertise and resources to enforce rules, as well as the authority to exclude noncompliant actors from the market.[49] In particular, the Draft AI Act establishes both pre-marketing and post-marketing controls and enforcement mechanisms.

Prior to their placing on the market or putting into service, providers of high-risk AI systems must undergo conformity assessment procedures, Articles 16 lit e, 19 Draft AI Act. Most conformity assessments are based on *internal control*, Article 43(1a), which is essentially self-assessment. Article 43(1b) requires an assessment of the quality management system and of the technical documentation with the involvement of a *notified body* only for biometric surveillance systems and products, such as medical devices, whose sectoral legislation already requires the use of notified bodies.[50]

After an AI system is placed on the market or put into service, the provisions of the Draft AI Act will be enforced by market surveillance authorities, Article 63(1) Draft AI Act, which can demand relevant information, e.g. on compliance and technical aspects of the AI system, start investigations, or impose penalties.[51] These penalties, including administrative fines, can be up to 30 Mio. EUR or, if the offender is a company, up to 6 % of its total worldwide annual turnover for the preceding financial year, whichever is higher, Article 71(1, 3, 4) of the Draft AI Act. Most importantly, market surveillance authorities have the power to require providers and users to take appropriate action or to take appropriate measures themselves to bring an instance of non-compliance to an end or to eliminate the risk. In particular, they can prohibit or restrict the marketing of a product or order withdrawal or recalling the product.[52]

5. Strict Regulatory Standards

The Brussels Effect globalizes the strictest relevant regulatory standard of all relevant standards in place, even if that standard is weak in absolute terms. There is an incentive to adhere to the most demanding regulation as it allows access to all relevant markets. At the moment, the requirements of the Draft AI Act likely constitute the highest standards for AI systems, because it is the first comprehensive legislative proposal to govern AI and other markets of equivalent size have weaker fundamental rights protections.

The Draft AI Act puts forward a risk-based approach, distinguishing AI systems that create unacceptable risks (Title II), high risks (Title III), limited risks (Title IV), and minimal risks (Title IX):[53] Article 5(1) prohibits manipulative systems that intentionally (a) deploy subliminal techniques or (b) exploit certain vulnerabilities due to a person's age or physical or mental disability to distort a person's behavior in a manner that causes or is likely to cause physical or psychological harm. It further prohibits social scoring systems (c) that lead to detrimental or unfavorable treatment either in other social contexts than that where the input data was generated or collected or that is unjustified or disproportionate to the social behavior the social score is based on or its gravity. Lastly, it prohibits (d) some uses of "real-time" biometric identification systems (note: not these systems in general!) in publicly accessible spaces for the purpose of law enforcement.

Another means of protecting fundamental rights is the inclusion of particular requirements for categories of AI that pose a particularly high risk to fundamental rights and other public interests, also known as essential requirements.[54] Enumerated in Annexes II and III of the proposal, high-risk systems include technologies such as biometric surveillance systems, systems used in education and employment, and systems used to make determinations regarding public services and benefits.[55] Essential requirements appear in Title III, Chapter 2 of the proposal. They vary widely, and include the use of a risk management system to identify and mitigate potential risks to fundamental rights and other public interests; provisions related to data governance, such as "an examination in view of possible biases"; logging capabilities that enable auditing; "an appropriate level of accuracy, robustness and cybersecurity"; design features and documentation that render the system's functioning transparent and understandable to users and oversight authorities; and technical documentation demonstrating that the system complies with high-risk requirements (see Articles 9-15 Draft AI Act).

If no other major jurisdiction imposes stricter AI regulation, this legislation could set the global standard by default. Even if other jurisdictions enact analogous legislation, the AI Act would likely remain the strictest global standard relative to other jurisdictions of equivalent market size. This is highly likely since the other two major market powers have

46 *Bradford* (Fn. 7), pp. 58 et sq.
47 *Bradford* (Fn. 7), pp. 61 et sq.
48 *Bradford*, Int. Rev. Law Econ. 42 (2015), 158 (161).
49 *Bradford*, Int. Rev. Law Econ. 42 (2015), 106-107.
50 *Veale/Zuiderveen Borgesius*, Comput. Law Rev. Int. (2021), 97 (106).
51 Regulation (EU) 2019/1020 on market surveillance and compliance of products (OJEU L 169/1), Art. 14(4).
52 Regulation (EU) 2019/1020 on market surveillance and compliance of products (OJEU L 169/1), Art. 14(4)(g, h).
53 *Veale/Zuiderveen Borgesius*, Comput. Law Rev. Int. (2021), 97 (98).
54 Draft AI Act, Annex VI(3).
55 Draft AI Act, Annex III(1 and 3-5).

different regulatory approaches that are, in general, more permissive: The U.S. is less likely to prevent many business models involving AI for the sake of human rights protection: The National Artificial Intelligence Initiative Act of 2020[56] rather focuses on accelerating research and application of AI in the interest of economic prosperity and national security. China's New Generation Artificial Intelligence Development Plan also focuses on driving economic development, enhancing national competitiveness, and protecting national security while also promoting AI as an opportunity for social and moral governance.[57] Even though the plan outlines China's aim to set a global standard in AI ethics, as well, it lacks concrete provisions and implementation measures, leaving loopholes in particular for government and government-endorsed companies.[58]

6. Interim Conclusion

The Draft AI Act will likely generate a Brussels Effect on the regulatory level for at least some industries and types of AI systems. In general, the EU has sufficient market power to attract foreign producers and providers of AI systems and is capable of enforcing its laws. Exporters will therefore have to comply with AI regulation if they want to access the Single Market. At least in the case of consumer, government, and institutional markets, circumventing EU regulations by moving business outside EU jurisdiction is rather unlikely as these regulatory targets are inelastic and thereby unable or unwilling to move.

Since in many cases it will not be feasible, at least economically, to design and develop different AI systems for different jurisdictions, it does not seem unlikely that a global standard for many AI systems will emerge. In this case, producers and providers are incentivized to comply with the most demanding relevant requirements because this allows them to access every relevant market. Currently, this strictest relevant standard is that of the Draft AI Act.

It is important to note, however, that achieving the Brussels Effect merely requires the *relatively* strictest standards: Market participants are incentivized to comply with the strictest relevant rules that are available. To set the global standard, it is, hence, sufficient if the EU's AI regulations are stricter than those of other important jurisdictions, especially of the U.S. and of China. This does not, however, guarantee that the EU will meet its goal of effectively protecting European values and its citizens' fundamental rights: This would require *absolute* regulatory stringency, not compared with other regulations but in view of the regulatory objective. Exploiting the Brussels Effect is, thus, possible, if it is possible to soften the law to the point where it is still stricter than any other regulatory regime.

IV. Harmonized standards and European standardization

The political and legal impacts of the AI Act will be mediated by the European technical standardization system, features of which will likely preclude the EU from protecting, let alone exporting, European values like respect for fundamental rights and democratic principles. Regulatory and governance frameworks underpinning European standardization are unsuitable for ensuring that fundamental rights requirements of the AI Act are translated into technical specifications. This primarily results from a paucity of human rights legal expertise in the standardization process. Meanwhile, the exclusion of most affected stakeholders from standardization undermines its democratic legitimacy. If European values like respect for fundamental rights and democracy are inadequately protected within the EU, it is unlikely they will be exported. Moreover, many European standards replicate international standards, which are heavily influenced by companies and governments from non-EU countries. Rather than exporting European values, they can import other countries' values, essentially creating a reverse Brussels Effect.

1. European standardization

a) New Legislative Framework

As one of multiple laws structured according to the EU's NLF, often referred to by its original name, the New Approach, the AI Act divides rulemaking responsibilities between EU institutions and private technical standard-setting bodies.[59] NLF legislation outlines high-level essential requirements for various manufactured products marketed in the EU, typically relating to health and safety[60]. Essential requirements are general rules for the protection of public interests, usually but not always concerning the health and safety of users of the regulated products.[61] To demonstrate compliance or conformity with essential requirements, providers can usually choose between developing their own specifications or adopting harmonized standards or common specifications.[62] Harmonized standards are technical or quality specifications issued by European Standards Organisations (ESOs), references to which are later published by the European Commission in the Official Journal of the European Union.[63] As harmonized standards are used voluntarily, essential requirements should be clear enough for a provider to implement them directly. Common specifications are issued when a reference to a relevant harmonized standard is unavailable.[64]

The NLF is designed to restrict political decisions and legal interpretations to EU institutions. Essential requirements are general in that they outline "the results to be attained, or the hazards to be dealt with, but do not specify the technical solutions for doing so".[65] Yet they are ideally detailed and precise enough to avoid misinterpretation and

56 Pub.L. 116-283, Division E, sec. 5001.
57 *Roberts et al.,* AI & Society 36 (2021), 59 (62-68).
58 *Roberts et al.*, AI & Society 36 (2021), 59 (69 et sq., 72).
59 European Commission, Commission Notice, The ‚Blue Guide' on the implementation of EU products rules 2016 (OJEU C 272/1), p. 5.
60 Regulation (EU) No 1025/2012 of 25 October 2012 on European Standardization (OJEU L 316/12), Recital 5.
61 European Commission (Fn. 58), p. 39.
62 European Commission (Fn. 58), p. 8.
63 Regulation on European Standardisation, Art. 10(6).
64 Draft AI Act, Article 41.
65 European Commission (Fn. 58), p. 39.

confine ESOs' decision-making to "technical details," reserving "all political choices" to legislators.[66]

b) European Standards Organisations

ESOs' standardization activities are governed by the Regulation on European Standardisation,[67] interinstitutional agreements, and internal rules of procedure.

The Regulation on European Standardisation recognizes the authority of three private entities to develop harmonized standards.[68] These are the European Committee for Standardization (CEN), the European Electrotechnical Committee for Standardization (CENELEC), and European Telecommunications Standards Institute (ETSI).[69] ESO membership is made up of national standardization bodies (NSBs), whose delegations are primarily composed of technologists from industry.[70] AI standards will mostly be developed by the newly formed CEN-CENELEC Joint Technical Committee 21 on Artificial Intelligence.[71]

After consulting ESOs and relevant stakeholders, the European Commission presents an ESO with a standardization request, Art. 10(1) Regulation on European Standardisation. Guidance documents state that these requests, including legal requirements and restrictions flowing from the NLF law, should be as precise and clear as possible.[72] The degree of precision should vary according to "the nature of the legal requirements being supported and the subject matter dealt with by a standard," ideally limiting ESO discretion to narrow technical decisions.[73]

Throughout the standardization process, ESOs must create opportunities for participation by all relevant stakeholders, particularly stakeholder groups whose participation is funded by the EU.[74] Stakeholder groups eligible for funding pursuant to the Regulation must represent small- and medium-sized enterprises (SMEs) or societal interests.[75] Societal interests are defined as consumer rights, environmental interests, and social interests, with social interests interpreted as workers' rights.[76] Currently the societal stakeholder groups are the European Consumer Voice in Standardization (ANEC), the European Trade Union Confederation (ETUC), and the Environmental Coalition on Standards (ECOS).[77] The Regulation does not guarantee voting rights to stakeholder groups.[78] Stakeholder voting rights and participation by other civil society groups and experts are governed by ESOs' internal rules of procedure.[79]

c) Publication and Legal Effect

Once a standard is complete, the European Commission decides whether to give it legal effect by publishing a reference to it in the Official Journal of the European Union.[80] This decision depends upon whether the standard complies with the Commission's original request, the essential requirements of the NLF law upon which the request is based, and the Regulation on European Standardisation, Art. 10(5), (6) Regulation on European Standardisation.[81] Assessments are performed by harmonised standards (HAS) consultants, which are currently supplied by the firm Ernst & Young.[82]

Upon publication, harmonized standards carry the presumption of conformity with essential requirements, or regulatory compliance, Art. 40 Draft AI Act. This means that when national market surveillance authorities seek to prevent or stop the use or circulation of an AI system employing harmonized standards, the authorities must fully demonstrate why it does not comply with essential requirements.[83] Otherwise, the burden would be on the provider to demonstrate its conformity.[84] It does not, however, affect

66 European Commission (Fn. 58), p. 6; Regulation on European Standardisation, Recital 5; European Commission, Commission Staff Working Document, Vademecum on European Standardisation in support of Union Legislation and policies, Part I: Role of the Commission's Standardisation requests to the European standardisation organisations SWD(2015) 205 final, p. 9.

67 Regulation (EU) No 1025/2012 of 25 October 2012 on European standardisation (OJEU L 316/12).

68 Regulation on European Standardisation, Arts. 2(8) and 10(1).

69 Regulation on European Standardisation, Annex I.

70 *Jakobs/Procter/Williams*, Telecommunication standardisation - do we really need the user?, IEE Conference Publication, 1998, https://www.research.manchester.ac.uk/portal/files/32554893/FULL_TEXT.PDF (last visited: 15/03/2022), p. 5.

71 European Committee for Standardization (CEN) and the European Committee for Electrotechnical Standardization (CENELEC), CEN and CENELEC launched a new Joint TC on Artificial Intelligence, 03/03/2021, https://www.cencenelec.eu/news-and-events/news/2021/briefnews/2021-03-03-new-joint-tc-on-artificial-intelligence/ (last visited: 15/03/2022), p. 5.

72 European Commission, Commission Staff Working Document, Vademecum on European standardisation in support of Union legislation and policies, Part II: Preparation and adoption of the Commission's standardisation requests to the European standardisation organisations SWD(2015) 205 final, §§ 3.5 and 3.6.

73 European Commission (Fn. 71), Fn. 26.

74 Regulation on European Standardisation, Arts. 5 and 16.

75 Regulation on European Standardisation, Annex III.

76 Regulation on European Standardisation, Recital 17, Art. 16, Annex III.

77 CEN-CENELEC, Societal Stakeholders, updated, https://www.cencenelec.eu/get-involved/societal-stakeholders/ (last visited: 15/03/2022).

78 Regulation on European Standardisation, Recital 23.

79 Regulation on European Standardisation, Recital 23.

80 Regulation on European Standardisation, Art. 10(5-6). The content of the standard is not published in the journal, and is usually not freely available to the public.

81 European Commission, Communication from the Commission to the European Parliament, the Council and the European Economic and Social Committee, Harmonised standards: Enhancing transparency and legal certainty for a fully functioning Single Market (COM(2018) 764), pp. 2-3.

82 CENELEC, European Standards for citation in the Official Journal, 27/11/2020, https://boss.cenelec.eu/homegrowndeliverables/en/pages/enforojeu/ (last visited: 15/03/2022); European Commission, Update on the European Commission's views on the broad context of harmonised standards: CCMC's Workshop "Preparation of Harmonized Standards," 12/06/18 https://experts.cen.eu/media/Experts/Trainings/Harmonized%20Standard/has_ws_ec-views-on-context-of-harmonized-standards.pdf (last visited: 15/03/2022).

83 See CJEU, C-613/14, ECLI:EU:C:2016:821 – Elliot, para. 56 et sq.

84 European Commission (Fn. 58), §§ 4.1.2.4 and 4.1.3.; Federal Ministry of Economic Affairs and Energy, United in Quality and Safety, https://www.bmwi.de/Redaktion/EN/Publikationen/united-in-quality-and-safety.pdf?__blob=publicationFile&v=6 (last visited: 15/03/2022).

questions of product liability.[85]

2. Inadequate Protection of European Values

Although the NLF is designed to prevent standard-setting bodies from making political decisions, in practice they apparently not only make these decisions, but do so unsatisfactorily. When drafting standardization requests, the European Commission endeavors to interpret essential requirements precisely enough to preclude any political decision-making by ESOs. Nevertheless, harmonized standards often fail to satisfy essential requirements, suggesting that essential requirements are presented ambiguously enough to leave room for interpretation. Yet ESOs are unsuitable forums for the kinds of substantive political decisions about fundamental rights the AI Act's essential requirements necessitate. Insufficient legal expertise about fundamental rights will prevent ESOs from adequately protecting rights implicated by high-risk systems. Incomplete stakeholder representation will undermine the democratic legitimacy of these decisions. By diminishing fundamental rights protections and democratic control over rulemaking, this scheme will undermine key European values.

a) Human rights questions raised by the AI Act

Essential requirements of the AI Act appear in Chapter 2, which outlines requirements of high-risk systems. They directly implicate a wide variety of fundamental rights and are worded so broadly that they leave significant room for discretion. For example, a high-risk system like a recidivism risk assessment program must have an "appropriate level of accuracy".[86] This means someone other than a legislator must decide how many people a state may put at risk of unfair imprisonment due to an AI system's inaccuracy, as this kind of prediction program is never 100 % accurate. The optimal level could depend on a variety of factors, such as the chosen benchmark and how costs and benefits are weighed. In this case, if the goal is simply to replace human judges to save money, then the relatively low accuracy level of around 62 % resulting from the use of human judges' accuracy as a benchmark could be deemed appropriate.[87] However, if the goal is to increase the fairness of the justice system, then this would likely be inappropriately low. Factors that vary among states, such as resource availability for imprisonment and rehabilitation services, would also influence the optimal accuracy rate. Not only are these substantive political decisions, but they also impact fundamental rights like the right to a fair trial.

Ideally, the European Commission would exercise all discretion in political decision-making and legal interpretation by precisely defining essential standards for specific technologies in standardization requests.[88] However, this process may not work as intended. Currently, there is a large backlog of unreferenced harmonized standards, in part due to failed assessments by HAS consultants.[89] This suggests that, even though the Commission construes broadly worded essential requirements more precisely in standardization requests, this wording is still imprecise enough to leave room for legal interpretation by ESO technologists, who generally lack legal expertise. Given that essential requirements in the AI Act relate to more abstract legal concepts than most existing NLF laws, such as the acceptable level of risk to all fundamental rights versus the safest dimensions of an elevator, ESO technologists will likely find it even more difficult to design harmonized standards that comply with the essential fundamental rights requirements of the AI Act. The problem lies not only with ESO technologists, but also with the paucity of legal expertise in the standardization process to assist ESOs.

b) Inadequate Legal Expertise

Legal expertise about fundamental rights in European standardization is insufficient for several reasons. Categories of AI labeled as high-risk in the AI Act, for which harmonized standards may be issued, implicate a wider range of fundamental rights than are represented by the stakeholder groups currently receiving EU funding. Yet other civil society groups and legal experts that could fill in the gaps find it difficult or impossible to participate, as a result of ESOs' internal rules of procedures. Legal assessments performed on behalf of the Commission take place only after a standard is complete.

While the Regulation on European Standardisation demands the inclusion of some fundamental rights expertise in the form of stakeholder participation and funding, this is limited to groups representing the interests of SMEs, consumers, workers, and the environment.[90] Though workers' rights and certain aspects of business and consumer rights overlap with rights enumerated in the EU Charter on Fundamental Rights (EU Charter), they represent only a fraction of the fundamental rights that will potentially be affected by the AI Act's harmonized standards.[91] One's right to education, Art. 14 EU Charter, will be affected by high-risk systems used in education and vocational training.[92] One's rights to equality before the law, nondiscrimination, and a fair trial, Art. 47 EU Charter, will be affected by systems

85 European Commission (Fn. 58), pp. 42 and 51, Fn. 26.
86 Draft AI Act, Art. 15(1).
87 Dressel/Farid, Sci. Adv., 17 (2018).
88 European Commission (Fn. 65).
89 European Commission, Standardisation Strategy Roadmap, https://ec.europa.eu/info/law/better-regulation/have-your-say/initiatives/13099-Standardisation-strategy_en (last visited: 15/03/2022), p. 1; *McFadden/Jones/Taylor/Osborn*, Harmonising Artificial Intelligence, 2021, https://oxcaigg.oii.ox.ac.uk/wp-content/uploads/sites/124/2021/12/Harmonising-AI-OXIL.pdf (last visited: 15/03/2022), p. 13.
90 Regulation on European Standardisation, Annex III.
91 Charter of Fundamental Rights of the European Union, C 364/1, 18 December 2000, Arts. 8 and 27-32.
92 Draft AI Act, Annex III(3).

used in the administration of justice.[93] Biometric surveillance systems will impact the right to privacy, the freedoms of assembly and association, and other rights, Arts. 7, 8 and 12 EU Charter[94] Asylum seekers will be affected by high-risk systems used in migration, asylum, and border control management, Art. 18 EU Charter.[95]

Opportunities for other civil society groups to participate in European standardization are prescribed in ESOs' internal rules of procedure, which create significant barriers to entry. The CEN-CENELEC Guide 25 outlines conditions for civil society participation in technical committees responsible for designing standards.[96] An organization must apply for one of several Partner statuses.[97] Eligibility conditions are both narrow and sometimes ambiguous. For example, a Liaison Organization must "cove[r] widely the relevant market," the meaning of which is undefined.[98] It must have representatives – either companies or national organizations – from at least four CEN or CENELEC member countries, which excludes most civil society organizations.[99] A Liaison Organization must also pay an annual participation fee of €570 per technical committee.[100]

Even if a potential Partner Organization can understand and satisfy eligibility criteria, they may never be aware of participation opportunities or understand the opaque and resource-intensive procedures of participation. Most civil society organizations are simply unaware of the significance of standardization or how it works, or lack the resources to participate effectively.[101] Those that do may have difficulty finding information about participation opportunities with ESOs. For example, the CEN website's "Get Involved" page requires a civil society group to unintuitively select a "European Industry Partners" link to find the CEN-CENELEC Guide 25, while a link to a "Societal Stakeholders" page leads to general information about ANEC, ETUC, and ECOS.[102]

No alternative modes of participation are provided for in CEN-CENELEC procedural rules. There are no opportunities for ad hoc participation in the style of, for example, the European Commission's "Have Your Say" public feedback website.[103] Individual experts from civil society are mostly excluded, as Partner statuses are generally reserved for organizations or representatives of EU institutions and agencies.[104] An individual could potentially be nominated as a subject-matter expert by a societal stakeholder group, but that assumes one can find information about these opportunities.[105] Furthermore, while HAS consultants bring legal expertise to the European Commission's assessment process before a standard is referenced in the Official Journal, this occurs only after the standardization process is complete.[106] Though this prevents nonconforming standards from carrying a presumption of conformity, it will not help ESOs to produce AI standards that conform to fundamental rights requirements.

This situation may change in the near future, as the European Commission's recent standardization strategy calls for changes to ESOs' internal governance that would expand opportunities for civil society participation.[107] If these reforms are insufficient, the Commission may even propose an amendment to the Regulation on European Standardisation to boost inclusiveness.[108] However, the Commission's main priority is neutralizing the power of third-country multinational companies in ESOs, and the limited range of interests currently represented by funded stakeholder groups is not identified as a problem to be remedied.[109] Therefore it is questionable whether the Commission's plans will produce sufficient legal expertise in the standardization process to protect fundamental rights impacted by the AI Act.

c) Democratic Legitimacy

Though any form of technocratic rulemaking may prompt concerns about democratic legitimacy, the AI Act will exacerbate the democratic shortcomings of ESO standardization. As private entities, ESOs lack the electoral accountability of a legislature and the political accountability of other public institutions. Theoretically, stakeholder participation by groups representing the interests of SMEs, consumers, workers, and the environment provides an alternative form of democratic representation. Yet stakeholderism as a form of democracy depends upon the representation of *all* affected interests.[110] Only a fraction of the interests implicated by the AI Act's high-risk systems are represented by existing stakeholder groups.

Theoretically, politically accountable actors maintain democratic control over standardization before and after it

93 Draft AI Act, Annex III(8).
94 Draft AI Act, Annex III(1).
95 Draft AI Act, Annex III(7).
96 CEN-CENELEC Guide 25, The concept of Cooperation with European Organizations and other stakeholders (3rd ed., November 2021), https://www.cencenelec.eu/media/Guides/CEN-CLC/cenclcguide25.pdf (last visited: 15/03/2022).
97 CEN-CENELEC Guide 25 (Fn. 96), p. 4.
98 CEN-CENELEC Guide 25 (Fn. 96), § 2.3.
99 CEN-CENELEC Guide 25 (Fn. 96), § 2.3.
100 CEN-CENELEC Guide 25 (Fn. 96), Annex I.
101 *Hauert/Bütschi/Graz/Audétat/Kaufmann*, ETUI Research Paper 14 (2015), https://www.etui.org/sites/default/files/Policy%20Brief-14-2015-Hauert%20et%20al.EN.pdf (last visited: 15/03/2022), 1 (1, 3).
102 CENLEC, get involved, https://www.cencenelec.eu/get-involved/ (last visited: 15/03/2022).
103 European Commission, Have your say, https://ec.europa.eu/info/law/better-regulation/have-your-say_en (last visited: 15/03/2022).
104 CEN-CENELEC Guide 25, §§ 2-5.
105 European consumer voice in standardisation (ANEC), Want to become an ANEC expert?, https://www.anec.eu/images/Publications/anec-leaflets/Becoming-an-ANEC-expert.pdf (last visited: 15/03/2022).
106 CENLEC, European Standards for Citation in the Official Journal, https://boss.cenelec.eu/homegrowndeliverables/en/pages/enforojeu/ (last visited: 15/03/2022), § 2.2.
107 European Commission, An EU Strategy on Standardisation. Setting global standards in support of a resilient, green and digital EU single market, COM(2022) 31 final, p. 4.
108 Ibid, p. 4.
109 European Commission, An EU Strategy on Standardisation Setting global standards in support of a resilient, green and digital EU single market, COM(2022) 31 final, p. 4.
110 *Goodin*, Philos. Public Aff. 35 (2007), 40 (51).

takes place. The European Commission is responsible for drafting standardization requests and approving references to standards in the Official Journal, and Member State representatives in the Committee on Standards can veto standardization requests and formally disapprove of (but not veto) references in the Official Journal.[111] However, given that it does not appear to be possible to segregate political and legal questions from technical decisions during the standardization process, their lack of involvement during standardization undermines democratic control of the process. In the Regulation on European Standardisation, EU lawmakers also decide which standard-setting bodies may issue harmonized standards for reference in the Official Journal, giving ESOs a degree of political accountability. Yet, due to the primacy of international standards, entities lacking this degree of political accountability often displace ESOs in the standardization process.

d) Primacy of International Standards

Even if European standardization could adequately protect European values in the design of AI, it can be rendered irrelevant by international standardization. Agreements between ESOs and their international counterparts make international organizations the preferred source of technical standards, which are then essentially ratified as European standards.[112] As of 2021, 44 % of CEN and CENELC standards referenced in the Official Journal derive from international standards.[113] Highlighting the crucial role international AI standards will play as harmonized standards when the AI Act goes into effect, the European Commission is heavily promoting the timely development of relevant standards in the joint subcommittee of the International Organization for Standardization (ISO) and International Electrotechnical Commission (IEC) that specializes in AI.[114]

Yet international standard-setting bodies benefit from even less democratic control and legal expertise about fundamental rights than their European counterparts. There is no legal or institutional mandate for inclusiveness equivalent to that of the Regulation on European Standardisation, nor do internal rules of procedure replicate it.[115] As in CEN and CENELEC, civil society groups may apply for liaison status in ISO and IEC technical committees.[116] Liaison Organizations are required to have "a process for stakeholder engagement and consensus decision-making to develop the input it provides," and national standards bodies "should be committed to informing and seeking input from a broad range of relevant national stakeholders on any new ISO projects when they are proposed."[117] Yet the same rules and recommendations do not explicitly apply to the ISO and IEC. Also, no matter how inclusive civil society groups are, in practice, few non-commercial stakeholder groups participate in the subcommittee responsible for AI.[118] One of these is the ETUC, which finds that international standardization lacks an "inclusiveness' culture".[119]

Particularly problematic for the promotion of European values is the heavy involvement of states and companies that are undemocratic or fail to respect fundamental rights. For example, the Chinese government is actively seeking to increase its influence over international standardization, in line with a broader effort to increase its influence in international and multilateral institutions.[120] Around the time the general public learned of the Chinese government's use of widespread biometric surveillance to monitor a specific

111 European Commission (Fn. 65), §§ 4.2.1 and 4.2.4; European Commission (Fn. 71), § 2.2.3; Dingemann/Kottmann, Legal Opinion On the European System of Harmonised Standards, 2020, https://www.bmwi.de/Redaktion/EN/Downloads/L/legal-opinion-on-the-european-system-of-harmonised-standards.pdf?__blob=publicationFile&v=3 (last visited: 15/03/2022), pp. 51-52 and 54.

112 Agreement on Technical Co-operation between ISO and CEN (Vienna Agreement), § 4, https://boss.cen.eu/media/CEN/ref/vienna_agreement.pdf; Guidelines for the Implementation of the Agreement on Technical Cooperation between ISO and CEN, 7th ed. (2016), p. 6 and § 5.2, Annex A.2.1, https://boss.cen.eu/media/CEN/ref/va_guidelines_implementation.pdf (last visited: 15/03/2022).

113 CEN and CENELEC, Joint Response to the European Commission Standardization Strategy Roadmap, https://ec.europa.eu/info/law/better-regulation/have-your-say/initiatives/13099-Standardisation-strategy/F2665566_en (last visited: 15/03/2022), p. 7.

114 ISO and IEC (2020), IEC and ISO present on the AI Ecosystem Standardization Program at the European Commission Workshop, "The Commission signalled that its intention is to strengthen ties with standardization organizations in order to ensure that high-quality standards can be made available to AI providers and the AI community by the time the AI framework will be applicable." https://jtc1info.org/iec-and-iso-present-on-the-ai-ecosystem-standardization-program-at-the-european-commission-workshop/ (last visited: 15/03/2022).

115 ANEC, Roadmap for the Standardisation Strategy: Roadmap Response, https://ec.europa.eu/info/law/better-regulation/have-your-say/initiatives/13099-Standardisation-strategy/F2665659_en last visited: 15/03/2022), p. 6.

116 ISO/IEC, Directives, Part 1 (17th ed., 2021), https://www.iso.org/sites/directives/current/part1/index.xhtml#_idTextAnchor093 (last visited: 15/03/2022), § 1.17.

117 ISO/IEC, Directives, Part 1 (17th ed., 2021), https://www.iso.org/sites/directives/current/part1/index.xhtml#_idTextAnchor093 (last visited: 15/03/2022), § 1.17.4.1-2; ISO, Guidance for ISO national standards bodies, https://www.iso.org/files/live/sites/isoorg/files/store/en/PUB100269.pdf (last visited: 15/03/2022), § 3.1.P3.

118 ISO, Guidance for ISO national standards bodies: Liaisons, https://www.iso.org/committee/6794475.html (last visited: 15/03/2022).

119 ETUC, Feedback on the (roadmap) consultation of citizens and stakeholders on the forthcoming "EU Standardisation strategy", https://ec.europa.eu/info/law/better-regulation/have-your-say/initiatives/13099-Standardisation-strategy/F2663296_en (last visited: 15/03/2022).

120 *Fägersten/Rühlig*, China's standard power and its geopolitical implications for Europe, in: ui Brief (Swedish Institute of International Affairs), https://www.ui.se/globalassets/ui.se-eng/publications/ui-publications/2019/ui-brief-no.-2-2019.pdf (last visited: 15/03/2022), pp. 10-13; *Teleanu*, The geopolitics of digital standards: China's role in standard-setting organisations, 2021, https://www.diplomacy.edu/wp-content/uploads/2021/12/Geopolitics-of-digital-standards-Dec-2021.pdf (last visited: 15/03/2022), pp. 27-34; *Trofimov/Hinshaw/O'Keeffe*, How China Is Taking Over International Organizations, One Vote at a Time, in: Wall Street Journal, https://www.wsj.com/articles/how-china-is-taking-over-international-organizations-one-vote-at-a-time-11601397208 (last visited: 15/03/2022); *Lee*, It's Not Just the WHO: How China Is Moving on the Whole U.N., in: Politico, https://www.politico.com/news/magazine/2020/04/15/its-not-just-the-who-how-china-is-moving-on-the-whole-un-189029 (last visited: 15/03/2022).

ethnic group in Xinjiang, a Chinese company's delegate to the International Telecommunication Union proposed a standard for biometric facial recognition that would have enabled the detection of gender, skin color, race, and similar characteristics.[121] European delegates opposed this standard because of its potential for discriminatory uses.[122] Another key player is the United States, which generally does not give domestic legal effect to international human rights law.[123] Dominant U.S. technology companies, which regularly push and exceed the limits of European privacy law, also participate heavily in international standardization.[124] These are the very actors EU institutions aim to counter by promoting European values in harmonized standards and digital policies like the AI Act.[125] Yet the AI Act enables these actors to import their potentially conflicting values into the EU via European standardization.

Rather than limit the influence of international standards in European standardization, in its new standardization strategy the European Commission aims to assert more influence in international bodies.[126] It is unclear whether the high-level concepts listed in the strategy will produce this effect.

e) Responsiveness

Delays in the European Commission's assessment of harmonized standards exacerbate the influence of international actors. A backlog of harmonized standards already awaits reference in the Official Journal.[127] These delays reduce the potential of harmonized standards to influence international standard-setting bodies and global markets through a "first mover" effect, which is one of the mechanisms by which European standards and regulations can produce a Brussels effect.[128] Such delays would be especially problematic for AI, in light of the rapid transformations that take place in the field.

V. Conclusion

Once enacted, the Draft AI Act will likely produce a Brussels Effect on the regulatory level, but not European values. On the regulatory level, the proposal meets each of *Bradford's* conditions, at least for several types of AI systems. In the AI industry, the EU's market power is immense, amounting to tens of billions of dollars. Where the AI Act targets inelastic markets, such as consumer, government, or institutional markets, market actors cannot easily evade EU regulation. For example, member states' law enforcement agencies using predictive policing programs cannot move to a jurisdiction outside the EU. Regulatory capacity in the EU is sufficient, as market surveillance authorities are empowered to take actions like banning a product from the market if a provider fails its conformity assessment. The AI Act's standards will likely be the strictest relevant standards, as markets of equivalent size have neither enacted analogous legislation, nor have effective human rights legal frameworks to underpin them. Standards for AI may be legally non-divisible for categories of programs whose output could potentially be used in the EU, or technically non-divisible where global companies use customer data to train machine learning algorithms.

However, given the shortcomings of the European standardization system, it is unlikely that this regulatory Brussels Effect will globalize European values. Fundamental rights legal expertise relevant to high-risk systems is largely absent from the European standardization process. This is because stakeholder group involvement is patchy and legal assessments by HAS consultants take place only after a standard is complete. Plus, the routine adoption of international standards by ESOs enables states and companies from jurisdictions with weak human rights laws and norms to import conflicting values. Inadequate stakeholder representation in a largely privatized rulemaking regime also deprives the public of control over an impactful type of rulemaking. It is unclear whether the Commission's new standardization strategy will change this situation in a meaningful way. If the AI Act does not compel actors within the EU to adhe-

121 *Teleanu* (Fn. 116), pp. 47-48; *Mozur*, One Month, 500,000 Face Scans: How China Is Using A.I. to Profile a Minority, 14/04/2019, https://www.nytimes.com/2019/04/14/technology/china-surveillance-artificial-intelligence-racial-profiling.html (last visited: 15/03/2022).

122 *Teleanu* (Fn. 116), pp. 47-48.

123 University of Minnesota Human Rights Library, Ratification of International Human Rights Treaties - USA, http://hrlibrary.umn.edu/research/ratification-USA.html (last visited: 15/03/2022).

124 ISO, ISO/IEC JTC 1/SC 42 Participation, https://www.iso.org/committee/6794475.html?view=participation (last visited: 15/03/2022); ISO, ANSI United States Membership: Member body, https://www.iso.org/member/2188.html (last visited: 15/03/2022); ANSI, Standards Support Advancements in Artificial Intelligence for Healthcare 7/22/2019, https://www.ansi.org/news/standards-news/all-news/2019/07/standards-support-advancements-in-artificial-intelligence-for-healthcare-22 (last visited: 15/03/2022);
European Parliamentary Research Service, Digital Sovereignty, for Europe, https://www.europarl.europa.eu/RegData/etudes/BRIE/2020/651992/EPRS_BRI(2020)651992_EN.pdf (last visited: 15/03/2022).

125 *Voss*, Draft Report on artificial intelligence in a digital age (2020/2266(INI)), Special Committee on Artificial Intelligence in a Digital Age, Rapporteur: Axel Voss, https://www.europarl.europa.eu/meetdocs/2014_2019/plmrep/COMMITTEES/AIDA/PR/2021/11-09/1224166EN.pdf (last visited: 15/03/2022), section 1.6.

126 European Commission, An EU Strategy on Standardisation. Setting global standards in support of a resilient, green and digital EU single market, COM(2022) 31 final, pp. 5-6.

127 European Commission, Standardisation Strategy Roadmap, https://ec.europa.eu/info/law/better-regulation/have-your-say/initiatives/13099-Standardisation-strategy_en (last visited: 15/03/2022), p. 1.

128 CEN and CENELEC, Joint Response to the European Commission Standardization Strategy Roadmap, 6 August 2021, https://www.cencenelec.eu/media/Policy%20Opinions/2021-08-06_cen-clc_response_ec_standardizarion_strategy_roadmap.pdf (last visited: 15/03/2022), p. 9; European Commission, The annual Union work programme for European standardisation for 2020, COM(2019) 486, § 2; Axel Voss, Draft Report on artificial intelligence in a digital age (2020/2266(INI)), Special Committee on Artificial Intelligence in a Digital Age, Rapporteur: Axel Voss, https://www.europarl.europa.eu/meetdocs/2014_2019/plmrep/COMMITTEES/AIDA/PR/2021/11-09/1224166EN.pdf (last visited: 15/03/2022), pp. 14, 22, 24 and 47.

re to European values, it is difficult to envision it exporting those values without significant changes to standardization policies.

Incorporating legal expertise and public consultation into the standardization process would likely improve the protection of fundamental rights and substantially democratize the process. Rather than limiting funding and guaranteed access to groups representing the interests of SMEs, consumers, workers, and the environment, the Regulation on European Standardisation could expand eligibility to groups with legal or policy expertise in every EU Charter right implicated by high-risk systems. A user-friendly public consultation system similar to that of the European Commission's "Have Your Say" website could enable experts without CEN-CENELEC Partner status to scrutinize and provide advice about future AI standards. This would be particularly useful during the standardization request drafting stage, in which the Commission and other stakeholders make the political decisions that ideally transform essential requirements into narrow technical questions for ESOs. The resulting expansion of civil society expertise in European standardization could also benefit international standardization. European civil society groups could apply their newfound expertise in international bodies, strengthening the influence of European values in international standards that eventually become European standards. These steps would bolster the EU's digital sovereignty, which is the ultimate goal of pursuing a Brussels Effect with the AI Act.