



European Economic and Social Committee

INT/877
Coordinated Plan on Artificial Intelligence

OPINION

European Economic and Social Committee

**Communication from the Commission to the European Parliament, the European Council, the Council, the European Economic and Social Committee and the Committee of the Regions -
Coordinated Plan on Artificial Intelligence**

[COM(2018) 795 final]

Rapporteur: **Tellervo KYLA-HARAKKA-RUONALA**

Referral	Commission, 18/02/2019
Legal basis	Article 304 of the Treaty on the Functioning of the European Union
Section responsible	Single Market, Production and Consumption
Adopted in section	02/04/2019
Adopted at plenary	15/05/2019
Plenary session No	543
Outcome of vote (for/against/abstentions)	210/2/1

1. **Conclusions and recommendations**

- 1.1 The EESC welcomes the coordinated plan on Artificial Intelligence (AI) and calls for urgency in its implementation, considering the rapid progress in developing and introducing AI outside the EU. To succeed in global competition, the EU must be at the forefront in innovation and investment, following the principle of "human in command" and trustworthiness of AI.
- 1.2 The EESC stresses that the development and uptake of AI must be inclusive as regards civil society actors, including enterprises, workers and consumers. The implementation of the AI strategy should thus focus due attention on how to make maximum use of the opportunities provided by AI for the whole of society.
- 1.3 The EESC endorses the initiatives to allocate more funding to AI-related innovation, infrastructure, education and training via EU financing instruments. The Committee also urges the Member States to take the necessary steps towards the common objectives.
- 1.4 To enhance the development and uptake of AI by the private sector, the EESC calls for a favourable business environment including an enabling and stable policy and regulatory framework that stimulates AI innovation and investment, considering the special needs of SMEs, start-ups and scale-ups.
- 1.5 The EESC finds it crucial to ensure the quality, availability, accessibility, interoperability and smooth flow of data in the single market, while securing data protection and privacy. The Committee urges the facilitation of access to public data and calls for supportive conditions for the establishment of European digital platforms.
- 1.6 The EESC endorses the initiatives on cross-border cooperation, partnerships and networks to foster innovation and the uptake of AI and highlights the importance of broad-based cooperation between different actors of society.
- 1.7 The EESC urges Member States to adapt their education systems to the new skills demand, which requires reforms from primary schools to universities. In addition, lifelong and ongoing learning is a necessity, and will increasingly take place in the context of work. Social dialogue plays an essential role in anticipating work-related changes and needs.
- 1.8 As regards managing AI-related structural changes, the EESC has considered the reinforcement of the European Globalisation Adjustment Fund as a step towards a fully-fledged European transition fund to help manage digital transformation.
- 1.9 The EESC stresses that the development and use of AI must take place in line with EU values and in compliance with consumer, labour and company related legislation. Civil society representatives and the social partners need to be involved in the preparation of AI-related policies and measures. Providing knowledge about AI is also necessary to enhance people's trust.
- 1.10 As AI must serve society at large and consider economic, social and environmental aspects simultaneously, the EESC suggests that the EU adopt the framework of sustainable

development as a guiding approach for future AI developments. The EESC also calls for the sustainable implementation of AI by individual organisations, including proper information and consultation practices.

2. **General comments**

- 2.1 Following the strategy on Artificial Intelligence for Europe published in April 2018, the European Commission worked with the Member States to prepare a coordinated plan on AI with the aim of maximising the overall impact of measures, particularly investment, at EU and national levels and ensuring that the EU can cope with global competition.
- 2.2 The coordinated plan proposes joint actions in four areas: increasing investment, enhancing data availability and accessibility, fostering talent and skills, and ensuring trust. The coordinated plan also calls on the Member States to put in place their national AI strategies by mid-2019.
- 2.3 The EESC welcomes the coordinated plan as an important step to enhance the implementation of the strategy. The Committee has provided its comments on the strategy in a previous opinion¹. The Committee has also submitted an opinion on the Digital Europe programme². Moreover, the EESC has prepared own-initiative opinions on different aspects of AI³, as well as several other opinions related to AI.
- 2.4 The EESC deems it important that implementation measures are planned both at EU and Member State levels, considering that the competences of the EU and the Member States vary in different policy areas. Cooperation and coordination are also necessary in order to maximise the results and efficiency from the point of view of the whole EU. The EESC urges all Member States to take the necessary steps towards the common objectives, while recognising the different conditions in different countries.
- 2.5 In addition to cooperation and coordination between policy-makers at different levels, cooperation is required between all actors of society. This is necessary to avoid inconsistencies, overlaps and gaps in action and thus to increase the efficiency and impact of measures.
- 2.6 The EESC calls for urgency in implementing the strategy, as progress in developing and introducing AI is fast outside the EU. At the same time, the EU and Member States should stick firmly to the long-term goals of the strategy. The EESC endorses the ambition for Europe "to become the world-leading region for developing and deploying cutting-edge, ethical and secure AI, promoting a human-centric approach in the global context"⁴.
- 2.7 To succeed in global competition, the EU must follow its own way in a determined manner, while at the same time recognising external developments and trends. The EESC finds it important that competitiveness and trust are considered together. Trustworthiness has the

1 [OJ C 440, 6.12.2018, p. 51.](#)

2 [OJ C 62, 15.2.2019, p. 292.](#)

3 [OJ C 288, 31.8.2017, p. 43; OJ C 440, 6.12.2018, p. 1; OJ C 345, 13.10.2017, p. 52; OJ C 190, 5.6.2019, p. 17.](#)

4 COM(2018) 795 final ANNEX.

potential to become a competitive edge for the EU, although other components of competitiveness must also be in place.

- 2.8 As AI must serve society at large, the EESC suggests that the EU take the framework of sustainable development as a guiding approach for future AI developments. Sustainable development with its three dimensions requires policies and measures that strengthen the economy and generate well-being for society, while also helping decrease climate and environmental impacts.
- 2.9 The EESC points out that AI-related policies must be designed from the point of view of civil society actors, including enterprises, workers and consumers. Due attention must be focused on how to make maximum use of the opportunities offered by AI for the whole of society and how to minimise risks, including the manipulation of democratic processes.
- 2.10 The EESC highlights the importance of inclusiveness and the principle of "leaving no one behind" in the development and uptake of AI. This applies to the accessibility of data and infrastructure, the availability of user-friendly products and access to knowledge and skills. Inclusiveness is important for both people and businesses, particularly SMEs. Special measures should be taken to increase women's skills in AI and encourage them to take up AI jobs and tasks, including in industry.
- 2.11 Given the huge societal challenges and the extremely rapid development of technologies, the EU should make full use of AI in predictive analysis regarding sectors such as healthcare and transport, including the issue of labour. Moreover, the EU should anticipate the opportunities inherent in disruptive technologies such as quantum technology.

3. Facilitating innovation and business development

- 3.1 Besides providing business operations with increased efficiency and productivity, AI also brings about new business opportunities for a wide variety of industries and services. This holds with both big companies and SMEs, start-ups and scale-ups. In addition, completely new businesses will be created.
- 3.2 Considering that a lot is happening outside the EU about the development and introduction of AI, the EU also must strengthen its efforts to improve its competitiveness. It is not about "picking winners" but rather about identifying problems and challenges to be tackled, with the aim of creating and maintaining the right conditions for making use of the opportunities and minimising the risks related to AI.
- 3.3 Investment in innovation and infrastructure and the further development of the single market are the core fields of action to be focused on. In addition, the EESC highlights the significance of the overall business environment, such as taxation, regulation and the availability of production factors, for the innovation activities and investment decisions by enterprises.
- 3.4 The EESC endorses the initiatives to allocate more funding to the development and uptake of AI. Instruments such as Horizon Europe, Digital Europe, InvestEU and the European Fund for

Strategic Investments are all valuable and necessary instruments to boost innovation and investment in AI.

- 3.5 While the public sector has a significant role to play through its own AI investment and public procurement, a lot of private investment is needed to generate adequate progress in both the development and uptake of AI in several sectors. Public funding provides leverage for private investment and is as such essential. Funding practices should however be made more user-friendly. Funding rules should also be developed to encourage risk-taking.
- 3.6 Business ecosystems, comprised of companies of different sizes and from different sectors and different parts of value chains, are necessary for the development and uptake of AI, and so is collaboration between businesses and various stakeholders. The EESC supports the Commission's plans to enhance cross-border cooperation, partnerships and networks through connected research excellence centres, testing facilities and Digital Innovation Hubs (DIHs). The EESC stresses the need to facilitate connections with SMEs and calls for the involvement of civil society organisations and the social partners in cooperation in the framework of the DIHs.
- 3.7 Competencies and skills play a significant role as an enabler of innovation and AI-related business development. There is demand not only for specific "AI skills" but also for skills to apply AI in specific businesses, including entrepreneurial skills. As new talent for business and industry is best promoted through research projects, the EESC urges the EU and Member States to ensure adequate funding for this kind of research.
- 3.8 The rapid pace of developments calls for agility in facilitating AI innovation. This requires testing sites and regulatory "sandboxes" that enable experimentation and piloting of new ideas. Furthermore, it is important to ensure the sharing and mutual recognition of test results.
- 3.9 The EESC calls for increased investment in the technology and infrastructure needed by AI and AI-based applications, including high-performance computers and 5G mobile networks, together with measures to improve cybersecurity. Moreover, the EU should be in the frontline in the development of quantum technology, especially quantum computing and quantum communications.
- 3.10 As AI is primarily based on data, the EESC finds it crucial to ensure the quality, availability, accessibility, interoperability and smooth flow of data, while securing data protection and privacy. A well-functioning single market in data is increasingly important, considering that it is interlinked with the single market in goods, capital and services.
- 3.11 The EESC supports the Commission's initiatives on creating a common European Data Space. The Committee urges the opening-up and facilitation of access to big data generated by the public sector for all users, and for the enhancement of Application Programming Interfaces (APIs). The EESC also calls for supportive conditions for the establishment of European platforms for data sharing. The enhancement of data accessibility and reuse must be aligned with fair competition and appropriate protection of data and intellectual property.

- 3.12 Business models based on data, platforms and ecosystems are becoming the "new normal". While business-to-consumer platforms are today mainly dominated by big companies from outside Europe, the EU would have significant potential to compete successfully in the fields of public-to-citizen and business-to-business platforms. A level playing field with respect to foreign competitors is in any case crucial.
- 3.13 The EESC calls for an enabling framework that stimulates innovation and avoids hampering development with overly detailed rules and requirements, while ensuring the trustworthiness of AI. The EESC also invites the Commission to assess together with the industries and stakeholders concerned whether there are pieces of regulation that might hinder the development or uptake of trustworthy AI, including the review of the fitness of competition law.
- 3.14 The EESC also calls on the policy-makers to consider policy instruments from the point of view of the sector in question. There are no one-size-fits-all solutions, but different sectors have their own needs and challenges to overcome. Full use of the opportunities provided by standardisation should be made for example in promoting interoperability, considering the speed of changes and need for continuous improvement.

4. Enabling people to prepare for the future

- 4.1 It is obvious that people are not largely aware of the opportunities that AI provides to assist them, while concerns related to control over the machine are clearly in evidence. The EESC therefore deems that there is a need for awareness-raising about the opportunities presented by AI for society at large. More knowledge and understanding of the nature and functioning of AI is also necessary to enhance people's trust based on critical thinking. Moreover, the EESC calls for improved statistical data and more research on the implications of AI for employment and work, including studies on sector-specific impacts.
- 4.2 Given that AI potentially has considerable implications for people's everyday life as consumers, as well as for the development of jobs and the work of the future, it is vital to provide people with the necessary knowledge and skills to be prepared for the changes. The social partners have an essential role in anticipating the changes in work, supporting the development of digital skills and enhancing the employability of workers in the labour market.
- 4.3 The deployment of AI implies considerable changes in the demand for skills. Due to the profound and rapid nature of AI's development, both immediate and long-term needs for training and education must be identified. Education must respond to the needs of both basic and advanced digital skills. In addition to ensuring basic AI literacy, general skills should provide people with the ability to apply AI in creating and using innovative solutions in their everyday life and work, associated with for example human-robot cooperation systems.
- 4.4 The EESC urges Member States to respond to the new skills demand by adapting their education systems. The EESC also stresses the importance of cooperation between governments, education institutions, the social partners, consumer organisations and other civil society organisations concerned in both designing and implementing new education and training programmes, to enhance skills relevant in the labour market and in society at large. AI should

also be used in evaluating skills needs as well as in organising and providing content for education and training.

- 4.5 Reforms are needed in curricula from primary schools to universities. A strong base in science, technology, engineering and mathematics is needed, while recognising that both the development and use of AI require wide competencies. This highlights the significance of education in social sciences and the arts, among others.
- 4.6 In addition to the development of basic education, there is an evident need for the upskilling and reskilling of people, including teachers. Lifelong and ongoing learning is a necessity for everyone to cope with current and future developments. Learning will more and more take place in the context of work and be based on individual ambitions.
- 4.7 The EESC believes that investment in education and training should be a central part of national AI strategies, and that good practices of national initiatives should be shared at the European level. The EESC calls for increased allocation of EU funds to support the necessary reforms and new initiatives in education and training.
- 4.8 It is also important to deal with the AI-related structural changes in the regions and sectors most affected by the deployment of AI. Member States should prepare approaches on how to narrow the skills gap and decrease negative social impacts, including the protection of those who are unemployable. Access to internet must also be ensured in all areas in order to avoid the digital divide. The EESC sees the reinforcement of the European Globalisation Adjustment Fund proposed by the Commission as a step towards the establishment of a fully-fledged European transition fund to help manage the digital transformation in a socially responsible way.

5. **Fostering trust in AI**

- 5.1 The EESC firmly believes that success in seizing the opportunities of AI requires solid trust in it. Trustworthiness is expected by consumers and employees, as well as by businesses – employers, entrepreneurs, investors and financiers.
- 5.2 Concerns related to AI will presumably decrease with increasing knowledge and understanding of what AI means, how it can be utilised and how its decisions are made. This will lay the foundation for trust in AI by enabling critical thinking and the consideration of fundamental issues such as the principle of "human in command" and the prospects for people maintaining control over their lives. On the other hand, trust is dependent on very practical aspects such as user-friendliness.
- 5.3 The European High-Level Expert Group on AI has recently launched ethics guidelines for trustworthy AI. The EESC takes note of these guidelines and points to the crucial role of open, adequate and reliable data, the transparency of AI decisions and the inclusiveness of the development and uptake of AI. The EESC also calls for broad-based discussions on issues such as the implications of profiling people and the prerequisites for challenging AI decisions.
- 5.4 If considered within the framework of sustainable development, the ethical aspects under discussion mainly include human-related aspects and thus fall within the social dimension of

sustainability. In addition, AI should consider environmental aspects such as those related to climate change and natural resources, including the sustainable use of energy and raw materials and the avoidance of premature obsolescence of products, among others. Furthermore, economic sustainability requires that AI solutions are economically sound, i.e. productive, profitable and competitive.

- 5.5 The impact of AI applications is yet another element of trust. If AI benefits society – in the spirit of sustainable development – by generating economic prosperity, social well-being and health, as well as environmental gains, it can be acknowledged as "doing good".
- 5.6 The EESC believes that trust in AI can be increased with citizen-centred public policy by involving civil society representatives in the preparation of AI-related policies and measures. The public sector can increase trust in AI also by means of citizen-centred administration, where AI might have a significant role to play by making administrative processes smoother and more tailored. Moreover, one should consider the opportunities provided by e.g. blockchain technologies to enhance trusted digital services.
- 5.7 The development and uptake of AI must take place in full compliance with the law, be it consumer, labour or company related legislation. There is a lot of legislation that is relevant to the development and use of AI. The EESC calls on the Commission to finalise and complement its evaluation of the relevant pieces of legislation e.g. in the field of safety and liability, with respect to their fitness for purpose in relation to trustworthy AI. The feasibility of relevant sectoral regulation should also be reviewed.
- 5.8 It is, however, most important that the approach and principles of trustworthy AI are adopted and introduced as an integral part of the culture of each organisation, both in the private and public sector. AI ethics should not be considered as something separate or different from ethics in general. Organisations should integrate AI ethics in their overall strategies, general codes of conduct and regular management practices, including the information and consultation of employees, as well as monitoring and auditing systems.
- 5.9 Proactive adoption of trustworthy AI can be enhanced by including ethical aspects in the education and training of AI developers and users, as well as by delivering and implementing ethical guidelines. The EESC is ready for its part to spread information on ethical aspects among civil society actors.

Brussels, 15 May 2019

Luca JAHIER
President of the European Economic and Social Committee