



Policy brief

ALGORITHMIC MANAGEMENT AND DEMOCRACY AT WORK IN HUNGARY

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Introduction

In the present wave of digital transformation, the vision of the traditional Industrial Relations System (IRS) actors in Hungary (i.e. government, employers' associations and trade unions) has been dominated by the "techno-centric" Industry 4.0 approach. Their view lags behind the fast-emerging vision of Industry 5.0 that places "the wellbeing of the industry worker at the centre of the production process...It moves focus from solely shareholder value to stakeholder value, for all concerned." (Cotta-Braque and De Nul, 2021: 3-4)

The government's approach focuses on human capital development and misses the practice of social dialogue with the IRS actors. For example, the 'Hungarian Artificial Intelligence Strategy 2020-2030' document fails to identify the role of social actors in the development of AI. It identifies two significant social requirements related to the spread of AI: the need to develop human capabilities through education and competence development, and the need to prepare the population for the technological changes AI brings.

Similarly to "Business Europe", the Hungarian employers' associations are in the early phase of exploration of the AI/AM at the workplaces. This position could be explained by the lack enough empirical evidence on the role AM plays in the workplace. According to the Eurofound report (2023), among the INCODING countries, Denmark has the "leading edge" position, followed by Germany and Spain and Hungary is the "trailing edge" country.

Trade Unions are in the cycle of awareness building based on European initiatives. The lack of financial, organizational, and human resources makes it extremely difficult to acquire the necessary knowledge sources to influence the transformation of AI/AM in the workplace. Although the European Union is attempting to help Hungarian trade unions and improve their AI-related expertise. It is not surprising that on the "Digital transformation" of the EU Recovery and Resilience Plan (RRP), the Hungarian social partners – similarly to their Latvian and Belgian partners – "did not provide a precise assessment of their involvement." (Eurofound, 2024:25)

Due to the infancy phase of the empirical data collection of the AM in the traditional workplaces – in comparison with the use of AM at the digital labour platforms – the Hungarian team carried out organizational case studies in firms operating in the knowledge intensive business service and logistics sectors.

The first company, Dataexpert Services, operates in the Information and Communication Technologies (ICT) sector as a "knowledge-intensive business service sector" that employs highly skilled and well-paid workers. The family-owned firm was created in 2007 and is an SME operating globally. The design and development of the AM in the labour process at Dataexpert Services are based on the employees' involvement and represent the so-called "High-Involvement-Working Practice" (HIWP) in the absence of trade unions. The second – unionised - company, Contract Logistics Firm (CLF), operates in the logistics sector, employing low-skilled and low-paid workers.

The central headquarters of the global logistics firm is responsible for the design of the AI/AM practices, while local managers were only involved in the implementation process, accompanied by short-term formal and On-The-Job Training (OJT). Trade union was not involved either in the design or in the implementation process.

Synthesis of major findings and highlights

The outcomes of the empirical work carried out by the Hungarian team (Farkas, Makó, Pap & Illéssy, 2023) within the INCODING project called attention to the following lessons:

- ☑ First, labour process and the actors involved (employees and managers) represent the key location of AM. Such characteristics of the labour process as employees' autonomy, the importance of tacit skills, decentralization of decision making, and teamwork have a decisive role in directing technological changes by employees. For example, in the case of DataExpert, a work organization that supports teamwork, problem-solving and empowerment of employees may create a collective voice even in the absence of a trade union.
- ☑ Secondly, in the case of CLF, automated data creation by Radio Frequency (RF) scanners created significantly improved transparency between input and output. For example, tasks related to picking, packing and shipping became visible and resulted in improved visibility of the mechanism of the piece-rate system. RF scanners created visibility via measuring input and output and helped to develop trust around performance and wage-related issues between workers and managers.
- ☑ Third, it is important to recognise the importance of the social learning process and the time it takes in such organisational structures. It takes time to determine whether the technical possibility of data protection risks will necessarily lead to the abuse of personal data and, if so, how the social partners will react to it. In any case, the experiences of the case study indicate that abuses and the resulting conflicts are not in the interest of either employers or employees.

Policy recommendations

Some policy recommendations can be formulated about collective voice formation and AM at the traditional workplaces in the knowledge-intensive business service and logistics sectors:

➔ Involving clients as relevant stakeholders

First, the four decades-long history of increasing use of digital technologies significantly increased income and social inequality. There is a growing awareness and debate on the

continuity of this trend with the recent use of the AI/AM. Hungarian case study experiences may help to develop counterarguments or to find the so-called “human-complementary” path of AM diffusion (Acemoglu, Autor & Johnson, 2023). For example, the first Hungarian case (i.e. DataExpert) represents a participative version of the AM development through the key role of employees in data creation and enlarging their tasks with entrepreneurial role (i.e. direct negotiations with the customers). These changes need to renew the traditional triangle stakeholder model of IRS stakeholders with the stakeholder eco-system involving customers – among others - in the collective learning process related to the AM design and continuous development. In this case, clients became key players in the digitalization process where “everything is connected to everything else.” (Guest, Knox & Warhurst, 2022:14)

→ Improving AI knowledge of trade unions

Second, at the CLF, the opposite process prevailed: transparency was unidirectional, that is, the management could monitor the performance of the employees, but they were generally not fully aware of exactly what data was being collected about them. Although a trade union operates at this firm, however, it was unable to assess the advantages (e.g. eliminating human error) and disadvantages (e.g. increased work intensity) of AM. To improve the bargaining position of trade unions in the social dialogue it would be necessary to set up a national-level AI/AM centre of expertise of the Hungarian trade union to overcome the present knowledge resource shortages of their organizations.

→ Unions cooperation

Third, due to the increasing impact of the global value chain company- and national-level trade unions need to develop project-type cooperation with other unions involved in the value chain. The exchange of knowledge among trade unions of the value chain may enrich the knowledge/competence resources of each participating trade union helping them in the bargaining process. Such cooperation should be encouraged by European and national research funds.

→ Third-party involvement

Fourth, it is necessary to transcend the present “wait and see” attitude of the Hungarian IRS actors. Instead of waiting for the EU-initiated new “super regulatory agency”, social actors of the Hungarian stakeholder’s “eco-system” need to discuss and assess the existing - although rather modest - systematic empirical experiences on AI/AM. To improve the reliability and quality of information on the existing (national, sector and company levels) experiences, it would be necessary to involve “third-party auditors” (PwC, Deloitte, etc.)

→ Producing consent

Finally, the case studies called attention to the lack of consent on the term AI/AM used among the social actors. For example, social actors in some cases stress the AI/AM role in the coordination/managerial functions, while in other cases the level of task automation is articulated. To create the flexible “AI/AM regulatory alignment” it is indispensable to

“manufacture” consent on the definition used by the social partners. (Guha, Lawrence, Lindsay, et. al. 2023).

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