



Workers managed by tech

An anticipatory
& participatory
approach

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OSH strategic litigation at a legal crossroads
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Research Question

A new **algorithmic management software** is implemented at the workplace and is combined with the obligation for the workers to wear a “**wearable device**” tracking (i) their **locations**, (ii) their number of **steps** and (iii) their **heartbeats**. This device also (iv) **allocates tasks**, (v) **reminds them of meetings**, (vi) **monitors the breaks**.

The workers do not have access to their data, and they do not understand how the tasks are allocated amongst them (random). It also appears that workers' representatives do not have the same “**opportunity**” than non-workers' representatives. All these factors provoke **stress and anxiety** amongst the workers who constantly watch without understanding these wearables' real purpose.

You want to challenge the use of wearable and algorithmic management software at the workplace: **What are the avenues possible, based on legal provisions and existing case law?**

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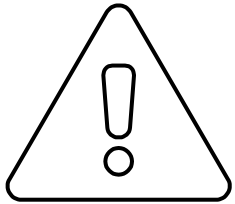
Algorithms are **complex sets of rigid or adaptable instructions supported by advanced statistics and fuelled by increased computational power**, which maximise efficiency with regard to assigning tasks, categorising items, targeting messages, allocating resources and forecasting events.

“Automated decision-making systems” (ADMS) partially or fully outsource choices to software. They operate in education, healthcare, finance and welfare. Not only **descriptive or observational**, they entail the possibility of **predicting and prescribing conducts**, pressuring workers to abide by rules.

Artificial Intelligence (AI), umbrella term for applications, standalone or embedded in tools, that **mimic capabilities associated with humans**. **Machine learning (ML)** can autonomously develop capabilities ‘by example and by doing’ and redesign procedures to pursue objectives.



The most **critical underlying asset** is **data**, particularly personal data, without which technologies could not operate in such efficient ways (collected through **wearables**, apps and software). **“Big” or “smart” data capture, storage and processing** constitute the backbone of digital operators' strategies, ensuring exponential advances in reprogramming business models and redeploying complex activities due to the high availability of data-collecting devices and computational power.



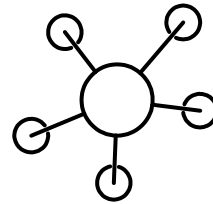
**Preliminary
remarks**

*the marvel and
the menace*



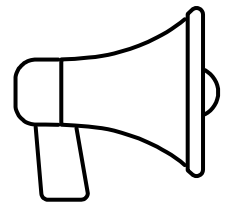
**Data
protection**

*promoting
legibility*



**Non
discrimination**

*a brad approach
to equality law*



**Collective
rights**

*you can't save
yourself alone*

- introduction -
boss ex machina
the marvel and the menace



The problem



wearables, AI & algorithms in workplaces

- what's new?

- Algorithmic management and surveillance through wearables involve:
 - A **slow and gradual makeover** that unfolds at different paces in different industries
 - An **invisible** trend that is also **faceless**, leading to a **chilling effect on** resistance
 - Competitive entitlements differentiated in a **tailor-made, evolvable** or **unintuitive** way
 - Presented as a **magic wand** for solving problems related to **OSH**, human subjectivity, bottlenecks, and systematic disparities in regular workplaces

The solutions



wearables, AI & algorithms in workplaces

- **the legal context**

- Labour law **moderates** the **unilateral discretionary power** of the dominant party by deploying controlling factors
 - **Are existing countervailing forces limited** as they were designed upon forms of power that were significantly less sophisticated than today's technocratic authority?
 - A **convergence** towards more encompassing and dissuasive methods
 - **Re-engineering strategic litigation**, by deploying responsive strategies to limit abuses before they are perpetrated

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data protection
promoting legibility



data protection

- Two roadblocks:
 - **Inferential analytics** –detecting correlations and patterns– could escape the GDPR
 - The **opacity** is an obstacle to the legibility
 - **Code mutates** after a decision is made
- This underestimates or obfuscates the **role** of the programmers, providers or users who:
 - **Decide to adopt** tools to pursue goals that could be achieved by less intrusive means
 - **Introduce key commands**
 - **Validate the original datasets**

data protection

- Misplaced emphasis on **transparency**
 - Such rhetoric shifts attention to inner workings, rather than **external effects**
- Litigants can rely on **evidentiary tools** that **leverage the lack of information**
 - Placing the **burden** on employers to deploy processes that are reasonable and reportable
 - **Instrumental** rights for **changing decisions** and laying the groundwork for a grievance
 - ▣ Art. 9 GDPR: the processing of **data concerning health shall be prohibited**
 - ▣ Exceptions: consent, OSH compliance, ...

impact assessment (DPIA)

- If data processing “is likely to result in a **high risk to the rights and freedom** of natural persons” (Art. 35(1) GDPR)
 - ~~A one-off exercise, before and after~~
 - Art. 35(3)(a) → DPIA for “systematic and **extensive evaluation of personal aspects** relating to natural persons [...] on which decisions [with legal effects] are based”
 - Art. 35(7) → DPIA must include a “systematic **description of the operations** and the purposes of the processing, the clarification of **necessity** and **proportionality**, the **risks** and the measures to address risks and demonstrate compliance with the GDPR”

information and access rights

Amsterdam court agreed that the **workers had been denied access to meaningful info on the algorithm**. Two transport companies, Uber and Ola, were ordered to **reveal information** about the **decisions** made, the data analysed and the **assumptions justifying the final choice**, allowing workers to verify correctness and lawfulness of the data processing.

- DPIA: channel for **examining** the lawfulness of processing or triggering legal remedies, thus allowing workers to learn more
 - Should not the DPIA be carefully drafted
- Art. 13(2)(f) + 14(2)(g) + 15(1) impose an obligation to **notify data subjects and grant them access** when involved in “automated decision-making, including profiling”
 - “Meaningful information about the **logic involved**, as well as the **significance and the envisaged consequences** of such processing for the data subject” must be provided

rights to redress & explanation

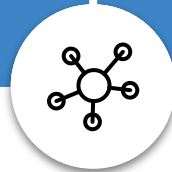
Amsterdam court: an **account suspension** was not considered to have “significantly” affected workers, which contrasts with the opinion of the Art. 29 WP. In a similar case, the **adoption of an automated system** for calculating **wage** deductions was considered ADMS and the court enforced the right to know main **assessments & specific weight** criteria in the model

- Art. 22 GDPR, **ban on decisions solely based on ADMS + profiling** with legal or similarly significant effects on data subjects
 - **Exception:** the processing is “necessary for entering into, or performance of, a contract”
 - **BUT** Section 3 “the [employer] shall implement suitable measures to safeguard the [employee]’s rights and freedoms and legitimate interests, **at least** the right to obtain **human intervention** on the part of the controller, to **express** his or her point of view and to **contest** the decision”
 - Recital 71, an **explanation** of the decision reached and to **challenge** the decision

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non-discrimination

a broad approach to equality



equality

Do workers' **steps and heartbeats correlate** with **age, sex, genetic features, disability**? Are decisions made on the basis of such data? If decisions are **standardised**, do they put workers with undisclosed protected ground at a particular disadvantage? How is it possible to **compare and contrast** the disparate impact if workers have no visibility on their colleagues?

- **Direct discrimination**
 - A person is treated *less favourably* than another is, has been, or would be treated in a comparable situation (**protected grounds**)
 - ▣ Sex, age, colour, ethnicity, political belief, ...
- **Indirect discrimination**
 - An apparently **neutral provision, criterion or practice (PCP)** would put [persons with a protected ground] at a *particular disadvantage* compared with other persons
 - ▣ unless that PCP is **justified** by a **legitimate aim** and the means of achieving that aim are **appropriate and necessary**

mobilising equality

An Italian court found an algorithm to be **discriminatory** for **treating** food-delivery riders **all the same**, regardless of the reasons for their absence, disadvantaging those who were on strike or sick, had a disability, or assisted a disabled person or a sick minor. The **uniform application** of a sanction had a disparate effect on workers who were exercising **constitutional rights**.

- Proof of a **nexus of causality** between the **conduct** and the **harm** as well as between the **action** and the **protected ground**
 - **Intent is irrelevant, effects matter**
- **Direct discrimination → no justification**
 - ▣ But need to demonstrate that a **less impactful practice** could not be adopted (predictive accuracy is not an alibi)
- **Indirect discrimination → justification**
 - ▣ Those who claim algorithms reduce arbitrariness rely on the argument that they “**answer to no one**”, which is precisely the rationale behind indirect discrimination

simplified evidentiary rules

- **Special evidentiary rules:** the burden of proof is partially reversed or shared between the claimant and the respondent
 - Victims need only establish in court **plausible** yet not conclusive facts from which it can be **presumed** that discrimination has occurred
 - ▣ This requirement can be fulfilled by showing that the employer did not comply with the **duty of care** or engaged in negligent conduct
 - ▣ **Statistical** or testimonial **evidence**
 - It is **incumbent on the presumed perpetrator** to demonstrate that the principle of equal treatment was not breached

by proxy & association

- **Discrimination** extends to cases where a person is treated unfavourably as they are **associated** with a protected ground that they do not possess (tailor-made)
 - **Coleman** → in favour of a mother based on her child's disability
 - **CHEZ** → residency associated with ethnicity
 - “[discriminatory] decisions are made on the basis of **characteristics related** to, but different from, protected grounds”
 - **QUESTION**: are **steps** a proxy for **sex**?
 - What if a **behavioural/economic incentive** is based on the number of steps taken?

access to information

2 orders issued against the food-delivery platforms. The Italian DPA interpreted the GDPR provisions concerning **lawfulness** as making a referral to the Workers' Statute, which provides for **co-determination**. Art. 88 GDPR was read as enabling rigorous national rules mandating the involvement of worker representatives as a precondition for the introduction of bossware.

- Hesitancy or reluctance to fulfil the duty under Art. 15 GDPR (access rights) may be used in court as **circumstantial evidence** supporting a *prima facie* discrimination case
 - The CJEU added that “refusal to grant any access to information may be **one of the factors to take** into account in the context of establishing facts from which [discrimination] may be **presumed**” in *Meister*
 - The “**interventionist**” role of **DPAs** is crucial, as they have the resources necessary to **facilitate access to documents**
 - Are worker reps familiar with DPAs?

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collective rights

you can't save yourself alone



association (*Coleman*),
proxy (*CHEZ*, residency),
reluctance to provide data
(*Meister* → Art. 15 GDPR)

intent does not
matter + **simplified
burden of proof**
(triggering *ex ante*
compliance)

Discrimination litigation:
effects are crucial, **no need
to “open the black box”**



Art. 9 **health data** is not
processable, but... OSH!

Art. 35 **DPIA**
(risk mitigation)

Art. 13, 14, 15
**information &
access rights**

Art. 22 **ban on ADMS** & profiling
(work-related exceptions +
objection & human intervention)

Recital 71 (**explanation**)

overcoming the current limitations

- With wearable devices and algorithmic management “**harms** typically arise from how systems classify and stigmatise **groups**”
- This intrinsic “**data network effect**” requires **responses at the collective level**
 - Data protection law is rather **individualistic and defensive in nature**
 - Non-discrimination struggles to capture the **disparate effects stemming from ADMS** affecting persons with characteristics outside the circle of protected grounds
 - **comparisons are** not easy at the individual level

a cultural paradigm shift

- ~~Retrospective and complaint-led answers~~
 - Issues mobilised in isolation + **damage-control approach**
- More strategic, less litigation**
 - Towards a pre-emptive model

multidimensional

business practices are shaped, not only challenged

collective

involvement of workers' reps as a "force multiplier"

preventive

pro-actively fostering equality & accountability

**workers are
not
defenceless**

3. co-design and training

Workers are in the best position to **draw up internal rules** due to their knowledge of **operational practices** and hurdles

Workers' representatives can foster **digital literacy**



1. consultation

Conducted from the **earliest phases** when companies are considering the installation or **revision** of electronic devices

The lawfulness for data collecting and processing (Art. 5 GDPR)


2. multistakeholder risk assessment and ex-post litigation

- Trade union representatives: (i) participating in the **DPIA** + filing claims before a court and exercising data protection rights before the employer or the DPA “independently of a data subject’s mandate” (Art. 80 GDPR).
- The same rights are laid down in the proposed **EU Dir. on Platform Work** (Art. 14)

thank you!

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