

## **Professor Rafael A. Calvo, Chair in Design Engineering, Imperial College London—written evidence (FON0047)**

### **House of Lords Communications and Digital Select Committee inquiry: The future of news: impartiality, trust, and technology**

#### **Executive summary**

We would like to put forward that the challenges of impartiality, trusted information and business models can all be understood through the lens of human autonomy. This transdisciplinary lens can provide an evidence-based framework to answer many of the key questions you have formulated. In the first section we describe this framework and later we answer the questions you put forward using it. Based on this analysis we make several recommendations to government.

#### **Recommendations**

1. Government should support transdisciplinary research that helps news organisations develop evidence-based approaches to autonomy supportive, rather than controlling messaging – particularly for their advertising and editorial work.
2. Regulation should target ‘dark patterns’ that have been identified as controlling – e.g. exploiting emotional states or personal characteristics.
3. Government should explore mechanisms that regulate businesses models centred on manipulation and differentiate them from models of producing news content (e.g. advertisement-based vs subscription based).
4. Regulation should include the requirement that companies disclose the use of Generative Artificial Intelligence, and the platform used (e.g ChatGTP, Bard, etc).
5. Government should support research on methods that companies can use to create influencing technologies that are autonomy supportive.

#### **About the author.**

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#### **Evidence**

Human autonomy is a pillar of contemporary ethics and politics, particularly in liberal democracies like the UK. Psychological research robustly shows that a personal sense of autonomy is essential to wellbeing and sustained motivation (Ryan and Deci 2017). Such felt autonomy also underpins user adoption, engagement, and satisfaction in (digital) design (Burnell et al. 2023; Peters,

Calvo, and Ryan 2018; Ryan and Deci 2017). Furthermore, most contemporary philosophical and political frameworks of autonomy were developed before or during the first industrial revolution, when influence threatening autonomy chiefly arose from the state not corporations, and were not automated, personalised, and pervasive. As science and scholarship have progressed, old models of autonomy have become contested, and research has fragmented across disciplines. For example, while philosophy, biomedical ethics, and law are concerned with autonomy as it relates to rights and capacities of self-governance, contemporary psychology defines it phenomenologically as a feeling, which critical social theory argues overlooks the real material conditions of its emergence. Feminist and non-Western philosophy, for their part, claim traditional conceptions of autonomy are unduly individualist.

Despite the diversity of conceptions for autonomy, the evidence shows that people's sense of autonomy is hindered by perceived surveillance and manipulation (i.e. non-endorsed behaviour change). These are the input and output data to new algorithmic influencing technologies such as advertisement engines and recommender systems which today provide personalised influence at unprecedented scale. The business models in the UK's news ecosystem drive the demand for such tools.

Empirical and theoretical evidence indicate that the concerns raised by the House of Lords today (i.e. impartiality, trusted information, and business models in the provision of news) are closely linked to such threats to autonomy. Furthermore, understanding the challenges from this perspective allows companies and regulators to build on existing evidence-based methods to address such challenges.

For example, concerns about autonomy are related to broader issues often addressed in the law. Protecting human autonomy is a key principle in many influential AI guidelines and frameworks, including the Montréal Declaration for Responsible AI and the European Commission's High-Level Expert Group's Ethics Guidelines for Trustworthy AI.

It is not just policy makers who talk about supporting citizens' autonomy. Businesses like Apple regularly describe their products as 'empowering people'. Autonomy is also, supposedly, of central concern to Alphabet who owns the largest advertising networks and sells behavioural targeting. Google's Wellbeing initiative aims to help users across their products "find a balance with technology that feels right for you"<sup>1</sup> by designing ways to help those affected by their AI (Ad Engine, YouTube recommendations, etc.) to use and relate to products in ways that align with their values and goals. The initiative was designed to respond to employee and customer concerns regarding the unintended impact of the technology on user autonomy. Calvo has advanced the concept of "Positive Computing" (2015), advising companies and running workshops (e.g. for Google) to help tech makers design in ways that support user autonomy. We believe there are positive, autonomy-supportive ways of 'influencing' (e.g. making recommendations, personalising products and services) that can support both companies and citizens.

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<sup>1</sup> <http://wellbeing.google>

Yet neither regulators nor businesses have a consensus on what these terms mean and how they can be measured and supported. **To develop evidence-based and legitimate regulation Parliament should seek consensus that can only be achieved through interdisciplinary collaboration and public participation – as in this call for evidence** ([recommendation 1](#))

Behavioural advertising (like Google Adwords) is made possible with data collected by tracking users, and funds many news channels today. To be sure, such persuasive technologies have long raised ethical questions across ethics, legal studies, HCI and STS. But today's techniques mark a step change, where traditional mechanisms of consent and self-management may be insufficient to protect individual autonomy.

These include deceptive patterns (a.k.a. 'dark patterns') that exploit cognitive biases to exert influence over our decisions in ways we wouldn't reflectively endorse and they can be readily identified. Where such patterns are used across news and other media companies they should be regulated (ultimately banned) ([recommendation 2](#))

The current news ecosystem is highly dependent on the revenues of advertising. Advertising engines use tracking and personalisation that can be exploited to make consumers feel 'controlled' and alienated. Discriminating what drives editorial decisions (editorial decision making seems a different issue to advertising?) is difficult for the general public, but being able to do so can support a sense of autonomy (via informed choice), and help users build trust in the news source. Therefore, we recommend government to require news channels to be transparent about their business models ([recommendation 3](#)) in ways that are easy to understand by the public.

While advertising can drive revenue, using Generative AI to generate text is now capable of reducing costs in unprecedented ways. However, GAI platforms are also likely to depend on advertisement and influencing. By using GAI, editors may be delegating many editorial decisions to those systems, and therefore shifting the responsibility of such influencing behaviours – for example towards a particular position regarding current affairs. Moreover, they are known to generate plausible fabrications (a.k.a. "hallucinations") and inaccuracies which, in the absence of robust fact-checking could degrade the quality and trustworthiness of news as sources. Government should require that they disclose the use of GAI, and the specific platform they use as well as implement appropriate fact-checking mechanisms to safeguard against AI generated fabrications ([recommendation 4](#))

Beyond shielding citizens from potential harms in the news ecosystem, policymakers and companies should recognise the value of designing to positively *nurture* autonomy, because it drives wellbeing, positive behaviour change, and meaningful engagement. Evidence-based design practices could be created that support industry, and citizens, with a more autonomy-supportive news ecosystem. Government should support research on how to design AI in an *autonomy-supportive* fashion. ([recommendation 5](#))

## Addressing the questions

Below we provide tentative answers to the questions raised using the framework described above.

### Key questions

1. *What impacts (positive and negative) do large technology platforms and online news aggregators have on the UK's news environment, including media plurality? And how might this change?*

Large technology platforms reduce the cost of entry to new players in the UK's news ecosystem. Lower costs allow new entrants to offer new perspectives. However, unless the total revenues for selling news increases, these an increase in supply mean companies need to find new sources of income to become sustainable. For the majority this means selling advertising which today is driven by algorithmic influence technologies which have the potential to personalise targeting in ways that can exploit vulnerabilities and undermine autonomy.

2. *How is generative AI affecting news media business models and how might this evolve?*

GAI provides a way to reduce costs the cost of generating content, so news organisations will be pressured to increase its use. Even the most advanced models generate fabrications and inaccuracies which, if used for writing journalistic content, especially if in an effort to speed up or cut costs, could undermine the quality and trustworthiness of news. Moreover, since AI models draw exclusively on previously written text, it will have a negative impact on the diversity of ideas. Moreover, it has already been shown that AI can be used to generate deep fake images that are non-distinguishable from real photographs of real events by the non-expert. This presents a significant threat to trust in a rushed news market.

In addition, GAI will likely earn its keep from influencing / advertising, so this trend means that more of the editorial work will also be moved to the GAI platform. The most significant editorial decision might end up being the selection of the GAI platform. This will have a negative impact on the diversity of ideas and would centralise influencing technologies in a few platforms.

3. *How are perceptions of due impartiality evolving and what challenges do news organisations face around impartial reporting?*

The public often perceives news organisations as 'manipulative'. In psychological terms this can be understood as hindering their sense of autonomy. This could be because they are not able to distinguish "news organisations" from other types of media (e.g. Facebook or TikTok). It may become necessary to consider independent certification and then oversight of trustworthy news sources to differentiate genuine journalism from sites or social media based purveyors of fake news.

4. *What factors affect trust in news and how might this evolve?*

We posit that the main factor mediating measures of trust is the perception of autonomy support or frustration felt by the public. If they feel manipulated, they lose trust. If the platform supports their sense of autonomy, they trust it. Autonomy is the mediating construct and can be measured.

- a) To what extent is trust linked to perceptions of impartiality, or to other trends in online news?

News may not need to be impartial to be trusted. If the biases are made clear and accepted by the public, the channel may be trusted. We tend to trust the opinions of people who don't appear to have hidden agendas, even if we do not agree with them. Trustworthiness may come from requiring that the news organisation makes the biases and their motivation to influence the public explicit.

- b) *What impact do concerns around disinformation have on trust in the information environment? (And to what extent does this differ between different sections of society?)*

Disinformation is a blight on trust because it is a form of dishonesty for manipulation, which in turn is a frustration of autonomy.

Evaluation

1. *How well are news organisations responding to factors affecting their business models, and are any changes needed?*

Subscription based business models seem to be growing. These models are more autonomy supportive, and not based on influencing behaviour. The only downside of subscription service is the potential to create a divide based on income. As such, it will remain the responsibility of government to provide a publicly available reliable source of news that does not require a subscription to ensure equal access (i.e. BBC)

- 2.a) *How should news organisations balance competing demands to provide content that aligns with particular values on the one hand, and provides trusted and impartial news on the other?*

Access to impartial news sources remains essential for supporting citizen autonomy as it is the only form of news provision that can come close to being free of manipulating factors. However, people will still seek content that "aligns with their values" and these should therefore make explicit these values, and any motivation to influence the client towards them.

3. *How adequately are news media organisations ensuring that efforts to provide trusted information and tackle disinformation do not alienate some sections of society in the process?*

Alienation comes from a sense of being excluded, controlled or exploited which are fundamentally violations of autonomy. Following established journalistic principles of impartiality and balanced reporting can minimise these effects.

## References

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