

Speech: The Impact of Science, Technology, and Innovation on Parliamentarians in Today's Socio-Political Environment

'Today, we stand at a pivotal moment in history—one marked by rapid advancements in science, technology, and innovation (STI). These forces are reshaping not only our societies but also the very roles we, as parliamentarians, play in the political landscape. As we navigate this new terrain, it's essential to understand how STI impacts our responsibilities and the steps we must take globally to address these challenges effectively.'

The opening of my speech was written not by me or any human writer but by AI. The advances of science present both a challenge and an opportunity for Parliaments.

We face so many issues in this space. In the United Kingdom we have in the last Parliament established a Government Department for Science, Innovation and Technology and a corresponding select committee.

The Changing Role of Parliamentarians

First and foremost, science and technology have fundamentally changed the nature of decision-making in governance. In an age where information is abundant, our ability to analyse data and make informed decisions is paramount. Today, we have access to sophisticated data analytics, research findings, and expert opinions that inform our policies. This allows us to craft legislation that is not only responsive but also grounded in solid evidence.

For instance, consider the ongoing discussions around climate change. The scientific consensus is clear, yet translating this into effective legislation requires an understanding of both the science and the

convention. The fast pace of progress of machine learning means that some of our conventions of human responsibility become moribund as autonomous systems take responsibility not just for targeting but hitting the kill switch. The AI singularity may emerge in combat first leaving both the question of responsibility and that of the protection of human life beyond both legislators and jurists nevermind the implications for human rights abuses. The 148th Assembly did groundbreaking work and we should restate the call for a ban on fully autonomous weapons, regulation and education on this emerging danger for humanity.

However as we all know the Internet has revolutionised our lives but also comes with challenges. The prevalence of misinformation and disinformation online can undermine public trust in our institutions. As parliamentarians, we must not only use these tools to communicate effectively but also work to combat misinformation, ensuring that our constituents receive accurate information. We must legislate to ensure that information is fact checked and that people are safe from harms online. We have passed legislation which will be enacted next year but is already looking like it needs updating due to technological advances.

Biotechnology is an area where we have had regulation since the 1980s with development of genetically modified plants and now new novel foods such as cultured meat or precision fermentation. These foods provide great opportunity to help end world hunger but need a regulatory regime which means they can be safely developed, eaten and exported.

Parliamentary oversight, co-operation and ensuring Governments are delivering the correct regulatory regime for the welfare of people and social justice in society.

socio-economic factors at play. As parliamentarians, we must educate ourselves on these complexities to create policies that address the urgent needs of our environment while considering economic impacts on our communities.

In the UK our Departments for Science, Innovation and Technology have 5 priorities are AI, engineering biology, Future telecommunications, semiconductors and quantum technologies.

The first stored-program computer was invented at the University of Manchester and Rosalind Franklin, James Watson and Francis Crick discovered the structure DNA and Jocelyn Bell Burnell discovered the Pulsar both at the University of Cambridge and in my own constituency Bragg discovered the structure of Crystals at the University of Leeds (and on a more frivolous level Faraday discovered carbonated water making all the fizzy drinks you enjoy possible). The UK has a proud history of scientific and technological discovery.

We as nations face multiple challenges where science and technology form part of the solution whether climate change, pandemics, global hunger or education.

The IPU is already making great strides for multilateral work on these issues whether Parliamentarians for the Planet and the Climate Education Advisory Committee or the work this assembly on regulating AI and ensuring we have global standards which was how we developed and have harnessed the Internet through the use of global protocols, these will be far more important with AI.

AI is used not just in the business and public sphere but is increasingly used in different aspects of defence especially making weapons autonomous as in previous generations we have tried to regulate conflict such as the Geneva Conventions or chemical weapons