

Article

Artificial intelligence and taxes. State of the question, uncertainties, and way ahead



Pedro Ángel Colao Marín

Pedro Ángel Colao Marín es profesor de Derecho Financiero y Tributario en la Universidad Politécnica de Cartagena. A lo largo de su carrera académica, ha publicado investigaciones en áreas como el tratamiento del inmovilizado en el Impuesto sobre Sociedades, las rentas irregulares, las rentas en especie, el IVA, los tributos medioambientales o la empresa familiar, así como en relación con la problemática de la prueba en el procedimiento tributario. Sus últimos trabajos se centran en las relaciones entre fiscalidad, nuevas tecnologías, inversiones relacionadas con avances técnicos o científicos y consecuencias de la inteligencia artificial, la robotización y la automatización en la vida económica, especialmente en la tributaria, de los sujetos, y en los retos que se están produciendo para los entes públicos. Mail: pedro.Colao@upct.es

Received 07 September 2023, Accepted 20 September 2023

KEYWORDS:

Artificial intelligence and taxes. Startups. Technological development and taxes.

ABSTRACT:

Artificial intelligence is producing a sea change in our world, and it's difficult to foresee the consequences it's going to produce in our lives, in fields such as labor, productivity or tax collection, among others.

Spain faces this situation in a not very comfortable position, due to its technological and entrepreneurial development, always in a good situation to jump to better positions, but never doing it.

Some tax measures have just been adopted to try to make the life a little bit easier for some kinds of entrepreneurs and scientists.

PALABRAS CLAVES:

RESUMEN:

Inteligencia artificial y tributos. Empresas emergentes. Desarrollo tecnológico y tributos.

La inteligencia artificial está produciendo cambios radicales en nuestro mundo, y es difícil predecir las consecuencias que estos van a tener en nuestras vidas, en campos como el del trabajo, la productividad o la recaudación de tributos, entre otros.

España se enfrenta a esta situación en una posición no muy cómoda, debido a su desarrollo científico y empresarial, siempre en buena situación para saltar a mejores posiciones, pero que nunca acaba de hacerlo.

Se han adoptado algunas medidas tributarias para hacer más fácil la vida de determinadas clases de emprendedores y científicos.

MOTS CLES:

RESUME:

L'intelligence artificielle et les impôts. Startups. Développement technologique et fiscalité.

L'intelligence artificielle produit des changements radicaux dans notre monde, et il est difficile de prédire les conséquences que ceux-ci auront sur nos vies, dans des domaines tels que le travail, la productivité ou la collecte des impôts, entre autres.

L'Espagne fait face à cette situation dans une position peu confortable, en raison de son développement scientifique et commercial, toujours en bonne position pour sauter à de bonnes positions, mais qui ne le fait jamais tout à fait.

Certaines mesures fiscales ont été adoptées pour faciliter la vie de certaines catégories d'entrepreneurs et de scientifiques.

CREATIVE COMMONS LICENSE Contents:



This work is licensed

under а Creative Commons Attribution 4.0 International License.

1 THE SITUATION 2 THE FUTURE

3 THE ONLY WAY OUT

4 BIBLIOGRAPHY



1 THE SITUATION

We live in times of change. It is true that this beginning could apply to almost any moment in history and that it is a cliché. Nevertheless, today, it is especially like that. Artificial intelligence, robotization, and automation (to reduce more complex issues to simple expressions) are bringing about changes in people's lives at an individual, social and work level, as well as changes in production, and these changes lead to an important impact in the present, and surely in the future, on public income and expenses.

This is the matter, and Spain is immersed in it in a not very "comfortable" way for several reasons that we will briefly see below. In the current situation, certain countries certain geographical areas, have reached the technological level that Spain had 40 or 50 years ago, and produce those goods that allowed us to maintain a certain standard of living. It is impossible to compete with them because not only do they produce cheaper, but little by little, they are incorporating high levels of quality, and at costs that are difficult to assume in our area. So, the questions are: what were we doing a few years ago that allowed us to maintain a standard of living? Why don't we do it now? And, above all, what about the future?

The changes are indeed caused by various factors: globalization, migratory phenomena, the ageing of society, climate change or the need to incorporate sustainable solutions into the production and consumption of goods and services (European Economic and Social Committee, 2017). Furthermore, there will surely be more, but digital technology understood broadly, is one of the most important factors in this dynamic.

Furthermore, attempts to venture into the future, to know the possible impact on the domestic product of the countries, on the quantity of work available, its quality and its new structuring, are conditioned by wide margins of uncertainty. As with all changes, science fiction movies and novels do not give us a clear or reliable guide to what may happen in the future. This has always been the case, but today, in the new situation, it seems to be even more so. Many reasons support this impression. On the one hand, our society turns any phenomenon into a massive eventuality because its incidence occurs very easily globally due to the dimension of communication capacity. A virus, or a new invention that 100 years ago did not spread or took centuries or decades to do so, spreads today at dizzying speeds, and its incidence does not occur in thousands of people but in millions.

However, secondly, another phenomenon is involved, at the same time, extraordinarily useful, exciting and dangerous. Artificial intelligence is not a technology (MGI, 2018). The steam engine was a technology applicable to various fields, but in the end, it replaced animal power with mechanical power and conditioned the spectrum of everything that worked with engines, to put it in an extraordinarily simple or concise way. Artificial intelligence is, however, an intellectual tool that can be applied to multiple physical or intellectual purposes. Guessing its impact cannot be done by studying a sector of economic and social life and projecting; There are many areas of impact and reciprocal conditions. If we jump from artificial intelligence in the strict sense to automation (Abbott, Bogenschneider, 2018) and from this to robotization, and if the analysis incorporates these factors, the range of uncertainty increases. Not to mention that the aforementioned fields are not always well delimited from each other, nor are there peaceful definitions or characterizations.

2 THE FUTURE

It does seem, however, that some things will happen in a way that we can predict to some extent.

 A production capacity and productivity change is occurring and will continue to increase.

- The impact of this change will occur unevenly. As far as work is concerned, it will be distributed unequally depending on production sectors, salary levels, education levels, types of work and even geographical areas.
- An upheaval in the world of work is foreseeable.
- A significant loss of jobs and a change in quality and structuring is also foreseeable.

All of this is already happening, but possibly, these changes have only just begun. (Executive Office of the President, -USA- 2016).

Focusing the analysis on work and the scope of public income and expenditure leads to certainty and a wide scope of uncertainty:

The certainty is that the work world will be extraordinarily "disrupted" if the expression is allowed. Much of public income comes from direct taxation on labour income, Social Security contributions, and indirect taxation, or contributions through other taxes (rates, special contributions), supported by recipients of said taxes income from work. The loss of jobs or the deterioration of their quality (salary, periods of inactivity, lack of connection to stable and organized productive structures with the capacity to deal with worker emergencies, etc.) will mean a decrease in income public, and this will coincide, as often happens in economic crises, with a pressing need for income to care for those left behind.

And the area of uncertainty? This manifests itself concerning the quantification of certainty. There is currently no way to know precisely whether, after a few years of change, the loss of jobs will be compensated or even overcome by the generation of others. Many factors generate uncertainty; Some of them are mentioned below.

Firstly, production is being disaggregated territorially. There is a tendency towards decentralized trade networks that are very connected to each other, which produce goods and services by adding factors from diverse geographical, economic and political areas. The traditional territorial settlement that allowed establishing control over work, its conditions, and the taxation of profits is fading (Monsellato, Pritchard, Hatherell, Young, 2018)

On the other hand, the impact on the world of work cannot be studied in the scope of jobs but rather in tasks within a specific job. Many positions will not disappear, but one or some of the tasks that comprise them will change. This can make certain positions even improve compared to the current situation.

Thirdly, and as has already been said, artificial intelligence is not a technology. It is a tool, a "capacity", that can be applied to countless economic and technological fields. Thus, it is not easy to calculate its exact impact because it is unknown whether the impact on jobs in one area, suppressing them but increasing general wealth, will generate new jobs in others in many of them. Artificial intelligence is going to be present.

Another issue that arises when trying to predict the consequences of artificial intelligence is the tendency towards oligopolies (European Economic and Social Committee, 2020). Increasingly, wealth accumulates in the hands of a few actors. This happens whether dealing with countries, people or subjects. Regarding countries, the United States and China still lead, with a considerable advantage over the first, the list of technological and economic power. Spain is not where it should be. Moreover, as far as the subjects are concerned, companies with technological capacity have certain characteristics (MGI, 2018):

- They investigate themselves.
- They do not share knowledge.
- They generate more and more wealth and absorb and neutralize, to end up liquidating, those who have been left behind.

• Finally, all this occurs according to a slower time cadence at first, which progressively acquires more speed. This "snowball" effect forever leaves more subjects out of the game. Since a country is made up, among other things, of a sum of subjects, if many fall, it is bad news for the country—furthermore, a speed component conditions the need for a quick reaction, even in a hurry.

3 THE ONLY WAY OUT

The only way out is forward. Losing your step means letting yourself fall and seeing how the distance that separates us from advanced countries increases so that it becomes insurmountable. The gap between advanced, educated, rich, backward, ignorant, and poor will increase. Even though solidarity is a fundamental component of human nature that must always be put into practice, it is true that to be supportive, you must be in a position to be able to do so, not poverty. Unfortunately, there is an extreme risk of polarization between very prosperous areas and increasingly poorer ones. You have to choose a country, a place, and a way to locate yourself. And it seems clear that the only intelligent option could be summarized in three words: invest, educate, and help (V. Executive Office of the President, -USA-, 2016)

Invest in future sectors. Invest in artificial intelligence and develop it. Artificial intelligence generates added value, and this is the only way to maintain the standard of living of the middle and working classes.

Educate, from the bases to all forms of continuous training. Preparing workers for changes at work greatly minimizes job loss and, in many cases, improves quality and remuneration.

Help. A social care system is needed to assist people who are temporarily out of work, or see their earnings reduced and those who are left out of the system more or less permanently. In both cases, helping includes, at ages still suitable for the activity, training to obtain new positions. The system must also be planned for those who do not hold stable jobs in the traditional sense but atypical positions or work independently. The more workers left with obsolete skills, the more difficult it will be to provide jobs and the more difficult it will be to generate the help necessary for their assistance (MGI, 2019).

According to estimates, Spain has 50% of jobs likely to be affected by changes in the immediate future, and many of them are in positions that make them very susceptible to being automated (Chand, Kostic, Reis, 2020). You must, therefore, take very seriously the advice that your Office gave to the president of the United States, a country light years away from us, but actively concerned by the situation. Education is at the centre of the strategy because it is the authentic raw material that makes and will make a difference. (V. Domenech, García, Montañez, Neut, 2018)

Has the situation in Spain been understood at a personal and institutional level? It is not clear enough. Time will tell; he will say it quickly because the "snowball" effect occurs quickly. It does not seem that the reaction time, the time to place oneself among those with a large middle class and a good standard of living is much. Spanish Law 28/2002, of December 21, refers in its preamble to some of the concerns expressed in the preceding words. He points out that Spain needs to invest in emerging companies, and within these, those that generate high added value, growth possibilities and a good climate for research, development and innovation because they are (only) those that can maintain levels. Of life at acceptable levels. This means attracting talent and investment, taking care of them, and competing with countries that pamper knowledge. It implies attracting and stopping investing in training to see how young and worthy women and men have to go in much larger numbers than desirable to generate well-being in other areas. That is, it also implies retaining.

From a tax point of view, emerging companies with a technological or innovative substance represent certain peculiarities: the investment poses a significant risk, and they need financing and "intelligence" from the very beginning and before the economic maturation of their project. They need legal security. The preamble of the aforementioned law says that Spain has strengths concerning the issue (climatology, citizen security, cultural sphere, high-quality universities in a significant number and research clusters and creative industries in increasing numbers, among others)

From a direct tax point of view, and in essence, the law adopts measures to soften and defer the taxation of emerging companies in the Corporate Tax, improves the treatment in the Personal Income Tax, and in the Tax on Non-Resident Income, income in kind constituted by the receipt of shares or participations in the company itself and deductions for investment in new or recently created companies, and makes the taxation of those that have been given more flexible called "digital nomads".

All this is praiseworthy, convenient, and necessary; It is good but not enough. In Spain, we have to "generate a new environment", and this implies some things, among others:

- Give training, from the beginning, the attention it deserves, and the neglect of which is one of the great failures of our democracy.
- Respect talent. Promote it and give it the social prestige it deserves.
- Respect the company and the entrepreneurs and be clear that they are the engine of well-being and that only what was previously earned can be distributed.
- Search for formulas that guarantee public interests, do not delay and do not pose situations of uncertainty to subjects beyond what is strictly necessary.

In many of these things, we are failing miserably. Nevertheless, they are the only key to maintaining our standard of living.

Finally, a brief reference to nature.

When nature wants something to prosper, it does not limit itself to caring for four or five specimens like gold. Plant thousands and thousands. You must take care, but you must also be clear that to generate many interesting companies and talents, you must plant ten times more. The environment has to foster vocations, the ease of living in a decent way (ninety per cent of our young men and women know how badly many things are being done concerning this), and stimulate and encourage legitimate creation and legal wealth. Doing anything else is very unintelligent.

We choose, and we (not those who live on the other side of the world) will find ourselves in one situation or another.

4 BIBLIOGRAPHY

Abbott, Ryan, & Bogenschneider, Bret. (2018). Should robots pay taxes? Tax policy in the age of automation. Harvard Law and Policy Review, 2018. Vol. 12. Pgs. 146 to 175.

Aranguren Querejeta, Mj; Franco, S; Murciego, A; Wilson, James R. (2015). Los clústeres en España: para la especialización inteligente? Research 2015.https://www.researchgate.net/publication/301636532_Los_Clusteres_en_Espana_Palancas _para_la_especializacion_inteligente

BBVA. Domenech, R. García, JR Montañez, M. Neut, A. (2018). ¿Cuán vulnerable es el empleo en España a la revolución digital? BBVA Research, Economic Observatory. March 19, 2018.

- https://www.bbvaresearch.com/wp-content/uploads/2018/03/Cuan-vulnerable-es-el-empleoen-Espana-a-la-revolucion-digital.pdf
- Cadell Last. (2017) Global commons in the global brain. Technological forecasting & social change. 114, 2017, pp. 48-64.
- Chand, V, Kostic, S, Reis, A. (2020) Taxing Artificial Intelligence and Robots: Critical Assessment of potential Policy Solutions and Recommendation for Alternative Approaches -Sovereign Measure: Education Taxes/Global MEASURE: Global Education Tax or Planetary Tax. World Tax Journal, November 2020.pp.711-761.
- European Economic and Social Committee, (2017) Opinion of the European Economic and Social Committee on the 'Provision and development ofskills, including digital skills, in the context of new forms of work: new policies and changing roles and responsibilities' Approved in Plenary No. 528, of 9-20-2017. OJEU 2017 C 434/06. CELEX:52017AE1813
- European Economic and Social Committee. (2020) Opinion of the European Economic and Social Committee on 'Digitalisation and Sustainability – status quo and need for action from a civil society perspective' (Exploratory opinion) NAT/794. 9-17-2020. CELEX:52020AE1918
- Executive Office of the President, (USA) (2016) Artificial intelligence, automation, and the economy. December 2016. https://obamawhitehouse.archives.gov/sites/whitehouse.gov/files/documents/Artificial-Intelligence-Automation-Economy.PDF
- Innoventures Capital, AJE Región de Murcia, Instituto de Fomento de la región de Murcia. Observatorio inversión startups murcianas 2022. May 2023.
- Mckinsey Global Institute. (2018) By Jacques Bughin, Jeongmin Seong, James Manyika, Michael Chui, Raoul Joshi. Notes from the AI frontier: modeling the impact of AI on the world economy. Discussion paper September 2018.
- Monsellato, G; Pritchard, G; Hatherell, D; Young, L. (2018) Tax governance in the world of industry 4.0. Adapting global tax regulation for connected enterprises. 27-August-2018. Deloitte https://www2.deloitte.com/xe/en/insights/focus/industry-4-0/why-global-tax-governance-iscritical-for-industry-4-0.html