Internet Governance Forum Greece 2021 - Final Report

Introduction

The first conference of Internet Governance Forum Greece took place on the 13th-14th of November 2021 in Athens, Greece in a hybrid format which included on-site and online participation. The initiative was first launched in March 2021 and successfully held its first pre-event in June 2021.

Through the preparation of the first annual conference, the IGF Greece Organizing Committee made continuous and concrete efforts to build and include the Greek internet governance community in the different processes. The most important step in this direction was the publication of our Call for Issues with the aim of gathering the topics that the local community considers to be a priority in the realm of internet governance in Greece. The Call received almost 20 different topic proposals, which were then discussed amongst the members of the Multistakeholder Committee and shaped the Agenda of IGF Greece 2021.

The tickets[1] for on-site participation were sold out only two weeks after Registration opened, with the available 150 tickets getting distributed amongst students/youth (50%), the private sector (39%), academia (20%), public sector (6%), the technical community (5%) and civil society (4%). We gathered more than 35 speakers and workshop leaders, had a website traffic of over 1000 views with more than 800 unique visitors and more than 200 Zoom viewers and 400 Facebook viewers. Throughout the conference we made concrete efforts to involve our online participants just as much as offline participants by enabling questions on Zoom and publishing a dedicated Questions Form for this purpose.

We are incredibly happy and proud to have launched IGF Greece and bring the internet governance discussion back to Greece, 15 years after the Internet Governance Forum was launched in Athens. We look forward to disseminating the results of this discussion to our community and continuing to foster innovation and dialogue on good internet governance in Greece and beyond!

Partners

The realization of Internet Governance Forum Greece 2021 would not have been able without the support, trust and guidance of selected organizations and institutions. We are

---

[1] Attendance of the event was free of charge, but due to COVID-19 measures we were obliged to offer a limited amount of tickets to ensure that the number of participants would not exceed the allowed number of visitors on the premises.

deeply grateful for the Sponsors and Partners that allowed our vision to be turned into reality and showed their trust from day one of this project and would like to formally express our appreciation for their ongoing support.

Under the auspices

IGF Greece 2021 took place under the auspices of:

Gold Sponsors

Sponsors

RIPE NCC
RIPE NETWORK COORDINATION CENTRE

ICANN

QUALCOdonutsinc

INTRACOM TELECOM

(·>papaki

Communication Sponsors

ΑΘΗΝΑΪΚΟ - ΜΑΚΕΔΟΝΙΚΟ
ΠΡΑΚΤΟΡΕΙΟ ΕΙΔΗΣΕΩΝ
ΠΡΑΚΤΟΡΕΙΟ

RED comm

ΑΛΛΗΛΟΝnet
Το Παγκόσμιο Ελληνικό Δίκτυο Αλληλεγγύης υπέρ των νέων για
Σπουδές, Επαγγελματική Ένταξη, Σταδιοδρομία και Επιχειρηματικότητα

Polyphony on the internet

Details

- Form of discussion: Panel
- Speakers:
    - Clementini Diakomanoli, EU Communication expert- Athens Representation of the European Commission
    - Konstantinos Komaitis, Brave New Software Foundation
    - Charalambos Tsekeris, Vice-President of the National Bioethics and Technoethics Commission
- Moderator: Konstantinos Karpouzis

Introduction

The topic of the first section of the conference was proposed through the Call for Issues and finalized in collaboration with the Multistakeholder Committee. It focused on issues of pluralism, open dialogue and democracy on the internet. Key-points of the discussion were the role that the internet plays in promoting meaningful dialogue, but also how the so-called internet bubbles make it difficult to exchange views and create an "echo" effect on social networks.

Content

The discussion was initiated by **Ms. Diakomanoli**, whose presentation drew the public's attention to the issue of fake news. She stressed the fact that new technological means and algorithms exacerbate the problem of misinformation in the "economy of attention". She differentiated between the types of misinformation depending on the intention of the one who shares the information, but also the effect achieved by the initiator, which may even be coordinated actions of foreign state agents to the detriment of the population of another state. The speaker, after giving examples for each type of misinformation, stressed that based on Eurobarometer statistics, the average citizen is aware of the presence and danger of false information, especially for democracy. Referring to the effects of misinformation, Ms. Diakomanoli underlined that the phenomenon we now encounter often "blurs" the choices of citizens, increases polarization in society and erodes people's trust in politics and science. The speaker then referred to cases where the European Union has fallen victim to unfounded assumptions. The EU, especially during the pandemic, concentrates its efforts on specific areas of combating false news by defining [Action Pillars](#) and follows the steps of Detection, Analysis and Reporting of misinformation. In addition, very important developments include the strategic collaborations inside and outside the EU. to this end, as well as the establishment of the code of conduct for digital platforms, which is a tool unlike any other worldwide. Finally, the speaker referred to the European

Democracy Action Plan, a piece of legislation aimed at the security of elections and journalists, and the restriction of foreign interference in the electoral process. In closing, Ms. Diakomanoli referred to the actions of the Commission for essential information, but also to measures that can be taken by everyone on an individual level.

Responding to a question from the moderator Mr. Karpouzis regarding the ongoing debate in the European Parliament on the possibility of eliminating targeted advertising on social media, Ms. Diakomanoli stressed the important role that such ads play for the financial incentives of the platforms. She highlighted the lack of transparency regarding the management of personal data by the platforms as problematic, and underlined the need for a better understanding of these procedures, referring to EU legislation supporting this goal. Based on the second question of the moderator, Ms. Diakomanoli stated that the priority in the public debate consists of the recognition of digital platforms as a public good, and thus the creation of a corresponding regulation that binds the platforms. The necessity and support for the regulation of such activities intensified, in fact, after Ms. Hogan's statements against Facebook before the European Parliament.

Continuing, **Mr. Konstantinos Komaitis** analyzed the expected developments in content management in the future, emphasizing that this is a complex issue that will continue to concern the internet governance community. He referred to the need for a regulatory regime, which must take into account the specificities of the Internet. According to the speaker, social networking platforms now undoubtedly have a great influence on public debate and democracy and are characterized by opacity in their practices. At the same time, various governments around the world are taking advantage of the situation to gain more control over the internet. What is necessary is a legal framework able to achieve the necessary transparency without extensively restricting freedom of speech. Referring to the whistleblower Ms. Hogan, the speaker stressed that when proposing new policies it is important to maintain the central features of the Internet but also to protect the safety of users, e.g. with encryption methods. At a European level, the Commission is preparing the Digital Services Act package, a legislative framework with a key focus on transparency and a better understanding of content management practices.

Answering a question from the moderator, Mr. Komaitis stated that one of the phenomena that has been observed lately is that the public considers the problems of cybersecurity, privacy, etc. as immediate issues of the internet, which is a false assumption. The internet is exacerbating existing issues. Individual responsibility and proper information are essential, especially for young people, so that they know what the risks are and how the internet should be used.

Finally, **Mr. Tsekeris** began his contribution by referring to the role and development of the National Bioethics and Technoethics Commission, whose mission is to raise issues of digital ethics, along with bioethics issues, and the relationship between technology or techno-science and societal values. He noted that there is now a strong "inalignment" between collective values and technology, which the Committee wants to address as an advisory and opinion-providing body to the Greek state. Currently, the situation in the field

of information tends to be anarchic, said the speaker, emphasizing the fact that, based on recent scientific publications, Greece is particularly vulnerable to misinformation, as it is largely a "society of resonators" (reverberation chambers). This is due both to cultural factors and to the polarization and lack of dialogue and sense of common reference to reality. Thus, a culture of digital intelligence, technology and digital rights must be cultivated, as well as an institutionalized fact-checking as a public service accessible to all.

Regarding the relationship between technoethics and technology regulation, Mr. Tsekeris differentiated between them based on the fact that technoethics and digital deontology as a tool of technology supervision and technology regulation creates values and ethical practices. In addition, regulation, especially in the field of content regulation, must be forward-looking, that is, there must be foresight, a prospective investigation of dynamic trends, which will co-shape (through interdisciplinary and public dialogue) possible futures for technology and platforms. Agreeing with the previous speaker, Mr. Tsekeris underlined that technology involves new morphologies of power, but also new social dynamics that we must begin to process and understand throughout the educational process, taking advantage of the institutional arsenal and tools offered by the European Union.

In fact, Greek users, due to the absence of substantial digital education, are not only willing to offer a lot of personal information on the internet, but also overestimate their ability to recognize cases of misinformation. This makes them vulnerable and threatens the digital public sphere, which is also endangered by new digital inequalities, algorithms and the emerging deficit of participation and democracy.

Audience questions

Question 1: To what extent do you consider it possible to achieve the goals of correct information, while the institution of education is internationally discredited and disconnected from the process of digital transformation?

Question 2: How can we support online literacy specifically for older age groups?

Mr. **Tsekeris:** The educational system must be redesigned, since it was designed for a linear era. We need digital human capital and a flexible system, capable of adapting to the needs of society. New institutions are necessary to support resilience and digital trust. As the problems we face arise from the complexity of the internet architectural structures, the users, the current interests and the institutional framework, we need to focus on many different levels. In the future we will see strong contrasts between bottom-up initiatives, such as the IGF, and forces that want to colonize the internet and restrict personal freedoms and institutional controls.

Mr. **Komaitis**: The existing problems will be intensified with the introduction of the metaverse. In terms of education, there are examples within the EU, such as Estonia, where

the right information regarding the internet is a part of lifelong learning practices. It is important to give, in particular to the older generations who are now called upon to use technological services, the necessary tools to be able to utilize these services. The only way to achieve this is for the state to engage in in-depth training of these groups in the context of digital governance.

Mr. **Karpouzis**: Speaking about the education of young people, we can not forget that Europe is aging, and with these circumstances corresponding needs arise. Do you think that there is a justified lack of trust on the part of older citizens towards education and the state, which may prevent them from using these tools?

Mr. **Komaitis**: In general, we tend to forget about these groups. There are some efforts (eg by the OECD) to secure their rights, but because they do not as much revenue as young people in terms of technology, there is interest in creating a basis for them to safely use the internet. This will lead to significant problems in the future.

Mr. **Tsekeris**: According to research, Greece has one of the largest intergenerational technological gaps. In addition, creative uses of the internet are missing. We need to focus on a substantial perception of the internet regardless of age, so as not to lag behind developments.

Mr. **Karpouzis**: The algorithms select and adapt the content we see, and they can now make choices that under other circumstances we would have made ourselves, even in the context of e.g. the banking or justice system. Could we get to the point of demanding the use of interpretable algorithms?

Mr. **Komaitis**: This is what the EU is trying to do, while also taking into account intellectual property issues, aiming at transparency and interoperability. The trend we observe in algorithms, of course, is that the legislator internationally relies on such technologies to meet its objectives, e.g. by forcing platforms to develop algorithms to combat online terrorism. In this context, a balance must be struck between the positive aspects of algorithms and the risk of extensive use, as well as the transparency and protection of intellectual property, which the Digital Services Act seeks to achieve.

Mr. **Tsekeris**: The National Bioethics and Technoethics Commission is called upon to establish the framework of technoethics in Greece, and to give special importance to human dignity in the technological environment. What is needed in the context of technological capitalism is not its overthrow, but its humanization.

Conclusions and Policy Proposals

- The phenomenon of misinformation is now more common and "blurs" the choices of citizens, increasing polarization in society and eroding people's trust in politics and science.
- Currently, the situation in the field of information tends to be anarchic. In particular, Greece is especially vulnerable to misinformation, as it is largely a "resonator society" (reverberation chambers). This is due both to cultural factors and to the polarization and lack of dialogue and sense of common reference to reality. Thus, a culture of digital intelligence, technology and digital rights must be cultivated, as well as an institutionalized fact-checking as a public service accessible to all.
- A priority in the public debate consists in the recognition of digital platforms as a public good, and thus in creating a corresponding regulation that binds the platforms
- Social networking platforms now have a great influence on public debate and democracy and are characterized by a lack of transparency in their practices. At the same time, various governments around the world are taking advantage of the situation to gain more control over the internet. A legal framework that achieves the necessary transparency but does not restrict freedom of speech is essential.
- Public opinion considers cybersecurity, privacy, etc. problems to be immediate internet problems, but this is not true. The internet is exacerbating existing issues.

Artificial Intelligence

Details

- Form of Discussion: Presentations
- Speakers:
    - Aimilia Givropoulou, Homo Digitalis
    - Michail Kritikos, AI Ethics Review Service-European Commission
    - Apostolos Malatras, European Union Agency for Cybersecurity (ENISA)
    - Stavroula Tsinorema, National Bioethics and Technoethics Commission
    - Athina Fragkouli, RIPE NCC
    - Konstantinos Chlouverakis, Deloitte Greece
- Moderator: Vasilis Vasilopoulos

Introduction

Few technology issues have occupied the public opinion in recent years more than Artificial Intelligence. As part of our daily lives, artificial intelligence raises technological, legal, sociological and moral issues, which are directly related to human nature and blur the line between man and technology. In this section, the speakers presented recent developments and focal points on artificial intelligence and the future changes it will bring about on a personal and social level.

Content

Aimilia Givropoulou | Homo Digitalis

Ms. Givropoulou's presentation was based on the question "Artificial intelligence: Ethical or legal issue?" and referred to the fact that in the last two years the data collected for each citizen has increased, creating the ability for those in possession of that data in the position to form a complete profile of each of us.

Ms. Givropoulou referred to Homo Digitalis' complaint against the presidential decree that allows the Greek Police to use a Drone to prevent and deal with criminal activities, guard the borders and control order and traffic. The decree contained ambiguities and posed the risk of collecting identifying data in the form of photographs or videos.

She continued with the explanation that Artificial Intelligence (AI) in our daily lives is not only applied for the use of robots and drones but also for the purpose of drawing conclusions from algorithms.

The proposals of Homo Digitalis in the open consultation of the European Commission for the new regulation in the field of AI include:

- Neutral definition of AI so as not to exclude technologies and applications that we have not discovered yet
- Clear prohibitions regarding the use of AI to the detriment of citizens and their rights (e.g. Social scoring)
- Special attention, transparency and regular evaluation when using AI in high risk systems
- Use of language understandable to the technical, legal and civil communities and the users of AI
- Prohibition of the use of AI for data collection in public places

She also referred to the European initiative "Reclaim your face", which focuses on a request towards the European Commission to ban the arbitrary and indiscriminate use of biometric data that could lead to mass surveillance, including the development and implementation even at the trial level of such systems by public or private carriers.

Ms. Givropoulou asked some questions to the public, which she left open for further analysis:

- Should an employer be able to process our facial expressions in order to decide whether to hire us?
- Would we accept the police to put us on a list of suspects because of the way we walk?
- Would we accept stores only showing products that "fit" our supposed gender and/ or nationality?
- Would we accept being barred from entering a place like a conference or the Greek Parliament because of our participation in a procession in the past, or because of our friends on social media?

Ms. Givropoulou concluded that information about our daily lives and choices is constantly being collected. The massive monitoring of these habits, as well as the patterns that are created, prevent us from behaving based on who we really are. In conclusion, privacy is very important and it would be advisable not to forget it or to sacrifice it indiscriminately.

Mihalis Kritikos | AI Ethics Review Service-European Commission

Artificial intelligence has been the subject of political consultation on a European level for the last 6 years. Political engagement with the subject began when the European Parliament started to highlight the ethical dimension of the potential impact of its AI resolution in 2017, thus setting the agenda for the issue to be discussed in the coming years. Another resolution followed in 2019 confirming and updating the content of the previous one. The European Parliament's reflections were followed by the European Commission White Paper on AI in 2020, with the latest Commission Legislative proposal for

a new regulation in the field of artificial intelligence (AI) in April 2021, with a risk-based approach differentiating between four categories:

- AI systems without significant impact
- AI systems with some impact, for which there will be ways to prevent and deal with
- High-risk AI, which should be regulated strictly
- Unacceptable risk AI

This proposal has triggered a number of statements being made by European Parliament in the last 6 months through resolutions, while its final position will be taken in about 1.5 years together alongside the position of the Council as co-legislator.

Mr. Kritikos referred to the main goal of the EU to set a clear framework and legal standards for AI, aiming at its responsible development and use, and in particular its licensing process so that the approach followed is human-centered, does not threaten basic principles of European culture, and AI applications serve the citizens instead of exploiting them.

Mr. Kritikos concluded that big tech companies have the technical superiority and are always one step ahead of the legislator, therefore the framework of AI ethics must be dynamic and adapt to new technologies. At the same time, citizens should be technologically educated and introduced to these discussions by people with an IT background, in order to create a framework that is legally corresponding to technology.

Mr. Kritikos was then asked questions by the public and the moderator of the discussion, Mr. Vasilopoulos.

Question to Mr. Kritikos: Could it be that the user himself is now the product?
Answer: Indeed. We live in a society not built around (right) information, but in a society that relies on managing a huge amount of information - it is data intensive. Humans and their daily lives have become tools - the object of algorithmic processing. That is why there is a discussion about intervention by design, so that systems take into account specific ethical principles and values.

Question to Mr. Kritikos: What do you prefer, ethics by design or ethics by default?

Answer: Ethics by design is the primary model due to the fact that it constitutes and copies the privacy by design model introduced by the GDPR. Also, it is now technically possible to come up with "ethical algorithms" that can translate ethical values principles into

computational principles, through organizations such as the IEEE. But ethics by design is not a panacea, as you can not predict everything from the beginning, because of how dynamic technology is.

Apostolos Malatras | European Union Agency for Cybersecurity (ENISA)

Mr. Malatras started his presentation with the position that cybersecurity is important for artificial intelligence and artificial intelligence is important for cybersecurity, with the former not being studied as extensively as the latter.

In recent years, artificial intelligence applications have been developed without necessarily being accompanied by the development of security technologies to protect both artificial intelligence models and algorithms, as well as their data.

In this way, an "ecosystem" of cyber threats against applications of artificial intelligence has been created, with the following characteristics and results:

- Data alteration that affects performance and results
- Difficult analysis of what happened - in relation to "conventional systems" - due to the nature of TN
- Issues of securing privacy and certification of applications

Mr. Malatras referred to the group created by ENISA along with other European organizations, in order to understand and record the risks in artificial intelligence systems, for their entire life cycle, ie from ideation to production. 84 different causes for cyber attacks, belonging to the following categories, were identified:

- Data intrusion
- Natural Disaster
- System user error
- Legal threats
- TN system malfunctions
- Physical attacks
- Malicious activity

In conclusion, the speaker stated that the next step of ENISA is the publication of the mechanisms that can be used to secure these systems.

Athena Fraggouli | RIPE NCC

Ms. Fraggouli started with a short presentation of RIPE NCC and its role.

- NGO based in the Netherlands
- 20,000 members (ISPs, Telecommunications Organizations, Academia, Network Administrators)
- 1 of the 5 Internet regional registries responsible for Europe, the Middle East and Asia
- Registration of Internet resources in administrators
  - IPv4 & IPv6 addresses
  - AS numbers
- Services for the common good of the internet community

Ms. Fraggouli laid the theoretical basis for what the Internet is, defining it as devices that exchange data, find their way through IP addresses, with networks that must have specific characteristics (decentralized communication, without a hierarchy and self-regulating), while emphasizing that without the these characteristics we do not have the internet we know today.

She then analyzed the applications and risks of using artificial intelligence in networks. Artificial intelligence can predict a user's behavior by using their IP, location and routing data, and automatically make decisions that will affect the user navigating the internet. Due to these conditions the following risks are created:

- Coercion for a specific route based on AI
- Possible blocking of specific networks from a specific country
- Implementation by governments

The above are contrary to the principles of operation and the "unity" of the internet, because they cause:

- Nerwork fragmentation
- Risks to the integrity of the World Wide Web.

Ms. Fraggouli referred to the two main pillars of RIPE NCC actions, namely the participation in discussions on artificial intelligence policies, and the provision of technical expertise and information to the technical community in order to be more involved in relevant discussions, so that the solutions provided through artificial intelligence systems do not lead to the end of what we know today as the Internet.

Stavroula Tsinorema | National Bioethics and Technoethics Commission

The speaker began with a conceptual clarification of the term Ethics, as a field of regulatory characterization of human action, and its relationship with science and technology, on the one hand, and law and politics, on the other hand. She first identified the fundamental

moral principles, on the basis of which we seek to shape our relations to each other, as relations between free and equal persons in a well-governed democratic state.

Ms. Tsinorema presented the ethical and social challenges and concerns posed by the development of systems and applications of artificial intelligence.

- Ethical and social challenges:
  - Safety, damage prevention, risk reduction ('Dual use', 'Misuse / abuse')
  - **Individual freedoms and rights**. Privacy - confidential management of data (sensitive information, large-scale data collection, misappropriation by third parties, personalized advertising). Individual consent (terms of use)
  - **Justice:** Addressing inequalities in the distribution of benefits and risks (accessibility, exclusions, digital divide)
  - Challenges for **democracy** (fake news and anonymity on the internet)

- Ethical and social issues:
  - How is perpetration and responsibility allocated in dynamic socio-technical systems with AI elements? Who is responsible? Distributed responsibility.
  - Appropriate governance institutions are needed for planning, development, monitoring, supervision, control, certification.

She went on to argue that the ethical framework arising from the above considerations is structured on the basis of basic pillars of principles:

- Autonomy - respect for persons
- No damage, damage prevention
- Justice
- Benefit - solidarity - social cohesion

All fundamental principles co-exist.

Ms. Tsinorema concluded that, as disruptive technology develops within terms of uncertainty, it is necessary to follow a risk-based approach / model of technoethics with key points including:

- Respect for privacy
- Safety valves and ensuring the possibility of human control and verification
- Integration of security, social goals and ethical standards by design
- People as responsible and accountable actors.

Finally, she stressed the importance of shaping a techno-ethical responsibility (expressed through codes of ethics and ethics) with the participation of all stakeholders, with a European and international dimension and the need for global coordination.

Konstantinos Chlouverakis | Deloitte Greece

Mr. Chlouverakis opened his presentation by making the following remarks:

- By 2024, a 50% increase in the use of artificial intelligence is projected
- Cloud services have helped many small businesses to have digital and data analytics capabilities comparable to much larger companies
- The companies that have the most data are not Google or Facebook, it is telecommunications companies - this has recently started being used in various artificial intelligence applications.

The speaker went on to analyze the levels of artificial intelligence in terms of their functionality and complexity, and stated that we are trying to get to General AI, which would be the point where there is great complexity and minimal human intervention. The stages of development of artificial intelligence, which we must go through to reach this point, are:

1. Robotic Process Automation, automation of specific processes
2. Intelligent Automation, automation of the human workflow
3. Cognitive Analytics, imitation of the human judgement
4. Narrow AI, enhanced human intelligence
5. General AI. Automated human intelligence

Finally, he said that less than 1% of companies today truly/ universally use artificial intelligence which would mean having artificial intelligence solutions that can make strategic decisions. In contrast, 74% of companies have individual AI applications in their various departments, without this being able to produce automated conclusions and results, with many companies moving towards a unified use of artificial intelligence and its interconnection with both governance and strategy.

Conclusions and Policy Proposals

- Strengthening research on cybersecurity in artificial intelligence as a prerequisite for its reliable operation
- Greater involvement in policy planning discussions by people from the IT sector/ technical community

- The basic ethical principles in artificial intelligence models are freedom, common prosperity and democracy as well as the integration of social goals as a parameter of artificial intelligence systems
- Ethics by design with "ethical algorithms" is very important, without being a panacea as the evolution of technology can not always be predicted in advance
- A strict and dynamic legislative framework is needed for artificial intelligence, since self-regulation is not enough and technology is constantly evolving

Accessibility

Details
- Discussion format: Panel discussion
- Speakers:
  - Margarita Antona, Researcher, Institute of Informatics, FORTH - Academic Community
  - Giannis Vardakastanis, National Confederation of Persons with Disabilities & National Accessibility Authority
  - Katerina Pronoiti, Refugee.info, Civil Society
  - Nikolaos Panagiotopoulos, Refugee.info, Civil Society

Introduction

The issue of Accessibility arose from the discussions of the Multilateral Committee. The debate over internet accessibility is emerging as a huge necessity of today's world, at an age where technology plays a prominent role in our lives. Especially during the pandemic, the central position of technology in our daily life was highlighted, since it proved to be more than necessary to ensure our participation at the professional and social level.

Accessibility is linked to design, namely the process of creating products that can be used by people with the widest possible range of possibilities, operating within a wide range of situations. In particular, accessibility to the World Wide Web means ensuring that people with different abilities can access information and functions on the Internet just as easily. Lack of equal access exacerbates existing differences in a technological and social context that requires increasing connectivity to online services and experiences. Lack of accessibility is therefore a situation that nurtures and reinforces discrimination and at the same time is a necessity deeply linked to the democratic governance of the internet.

Content

The panel discussion held between Ms. Antonas, of Mr. Vardakastanis, of Ms. Pronoiti and Mr. Panagiotopoulos discussed the directions that the issue of accessibility has taken today as well as the difficulties that arise, referring to the technical framework of the internet, their institutional role with a purely political counterpart that contributes to the different directions of the discussion, or because they come in contact with particular social groups who have hurdles in gaining access.

As a representative of people with disabilities, Mr. Vardakastanis focused on his political role and in this capacity he seeks to influence policies, both nationally and internationally, so that the products and services provided on the internet are inclusive and accessible to people with disabilities by providing autonomy, a constitutionally protected fundamental right. He cited both national and international legislation supporting accessibility and the changes that have taken place in recent decades with the incorporation of more and more directives, and clearly linked the need for inclusion with democratic internet governance, stressing that, in its absence inequalities and discrimination are reinforced, something that the other speakers agreed on.

Ms. Antonas, from her position as a researcher, spoke about universal access from a technical point of view focusing on the methodology and tools that support it. She emphasized the importance of accessibility by design, whereby technologies are originally designed and developed to be accessible to as wide a range of people as possible, preferably without retrospective modifications, in order to avoid delay and conversion costs. She stressed that this design does not only concern people with disabilities, but also other groups, such as the elderly, groups with smaller limitation on many levels, people who use older technologies without having newer ones at their disposal, or people who interact in an environment that makes it difficult to use some technologies, such as in conditions with too much light, too much darkness, or too much noise.

The technological and methodological solutions that have been proposed mainly concern the initial design of accessibility in such a way that a product is immediately accessible to everyone. But this does not mean that there will be the same form of interaction for everyone, since the way a person who sees and a person who does not have vision interacts are very different, and therefore need user interfaces with different characteristics. But these two modes of interaction can be designed in parallel and coexist within an application, and a website or an online service and be provided to these users simultaneously.

In recent decades, Ms. Antona added, the field of accessibility has developed significantly and there is a satisfactory knowledge base, consisting essentially of web design guidelines developed by the W3C (World Wide Web Consortium), which describe how a website should be designed to be considered accessible. However, achieving accessibility is not just a matter of implementing guidelines, since in order for them to be implemented, there must be the appropriate development and evaluation. Although there are many evaluation tools, finding suitable development tools is more difficult. There is still no tool that is very easy for developers to use and generate an accessible website.

There is also the issue of browser accessibility. In order to produce a meaningful, accessible user experience, the browser must also be accessible, as it is not enough just to have accessible content. While there is knowledge and some tools available to some extent, their application in practice is very difficult. Ms. Antona noted that despite the legislation mentioned by Mr. Vardakastanis, and despite the fact that we all recognize that accessibility is so important, quantitatively there is a lot of work that needs to be done to improve the level of accessibility.

Taking the floor, Mr. Panagiotopoulos focused on refugee.info, a program that started in 2015 amidst the great refugee crisis in Greece, as an effort to provide cross-checked and reliable information in real time and in different languages. Today it is a refugee and migrant information hub that can learn how to access services aimed at receiving reliable information and thus empowering and protecting these vulnerable groups. The particular characteristic of the program is that it is developed and moves in different directions depending on what users seek and express a need for depending on their feedback.

Focusing on the challenges of such an endeavor, Ms. Pronoiti stressed that the main issues regarding accessibility revolve around untranslated information on the internet, which does not allow refugees to find the information they need, preventing them from accessing health services, social structures, education structures, etc. Of great importance is the fact that this part of the population is not informed in a timely manner, which leaves room and time for misinformation and consequently distrust of any protection measure, such as the COVID-19 vaccine. When a social group does not have clear information in their language, they can not easily trust the information. While several pages have been digitized, there is no connection between them, with one page being in one language and the corresponding one not being synchronized well, stressed Ms. Pronoiti, confirming what Ms. Antona mentioned regarding the enormous difficulty of finding suitable accessibility programming tools to be used and handled by developers.

As part of the effort to find effective solutions to promote accessibility, a text-to-speech application was created where the user could listen to the available texts in the language of

their choice. At the same time, refugee.info cooperates with the European Disability Forum in order to make an evaluation of the website and to make recommendations and proposals that they will undertake to implement. This will make the website even more inclusive. Mr. Panagiotopoulos underlined the great importance of internet access itself, something quite problematic for refugees, who often live isolated in refugee camps with many obstacles and reduced opportunities for access to knowledge and information.

Conclusions and Policy Proposals

After the very interesting presentations of the speakers, some conclusions and policy proposals emerged.

Mr. Vardakastanis_stressed that accessibility is **an independent, self-existent human right** and at the same time **the way to access the enjoyment of almost all other human rights**, whether we are talking about education, employment, culture, entertainment. It is the duty of those who legislate and formulate an implemented policy to ensure that citizens who have access issues will stop having them.

We must not only dwell on the aspect of internet access but also focus on the **financial possibility of acquiring the necessary assistive technology** and on the **education and training of users** as a measure to deal with digital illiteracy. He stressed that it is a complex issue that requires **comprehensive political will**, while he pointed out that while we are reaching a level where we have legally addressed an issue that can be technologically addressed, we have a flawed implementation.

Regarding policy proposals he stressed that accessibility must be combined with usability. **Users themselves should be involved in the accessibility review process.** Referring to the example of certain companies in the US, he focused on the logic of design for all and supported the idea of having **special sections for people with disabilities to test the applications before they hit the market.**

Ms. Antonas also offered some suggestions. She stressed the need to **continue the research**, so that we can move beyond the approach based on design guidelines, towards an approach based on the **individualization of the interaction and information** in accessible formats. In addition, she added that **Artificial Intelligence technologies** could be useful**.**

She also stressed the need to put **into practice** the existing framework, namely accessibility guidelines and standards. In agreement with Mr. Vardakastanis she supported that what is necessary is an **anthropocentric design** and not just evaluation, **with users being involved in all phases of design and development**. Another proposal that she

supported is the **training of designers and people in charge of the development of each application** , where universities and educational institutions can play an important role. As far as it is possible, starting at an **early age** and getting access to education are very important.

Finally, Ms. Pronoiti, while referring to people with a refugee background who also have a disability, linked these two important issues and noted that **a different institutional framework** is needed to cover them. She also noted that **more timely information is required**, and that there should be a **translation of public services into the languages of the people currently hosted** in Greece. Mr. Panagiotopoulos added that undoubtedly the state has taken some relevant steps towards accessibility, at least as far as the website of the Ministry of Immigration and Asylum is concerned, where there are parts that have been translated, although the website's navigation up to this point is complicated and only available in Greek. He believes that there are enough human resources to support the efforts of the Greek government to make **the content of the digital pages of the Greek public sector available in some predominant languages,** since at this moment there are surveys referring to about 900.000 people in need of these services that are not of Greek origin. The translation process is a time consuming process that requires accredited translators, something that should be able to be done faster. If Greece wants to effectively integrate these people, steps in this direction are necessary.

Mr. Vardakastanis concluded that the digital transformation of the Greek state can not be for everyone, if it is not governed by a strategy and implementation of this strategy focusing on inclusion. If the education system does not provide access to the digital part of education, students with disabilities will experience both the discrimination and exclusion of the traditional process, as well as the discrimination and exclusion produced by the inability to access education in the digital age. This in turn will create an effect of exclusion that will continue for the rest of their lives.

Law and the Internet

Details

- Form of discussion: Presentations
- Speakers:
    - Georgia Beka, ELSA Greece
    - George Giannopoulos, Associate Professor (Law School of EKPA)
    - Lefteris Helioudakis, Homo Digitalis
    - Ioanna Noula, Internet Commission
- Coordinator: Stefanos Vitoratos, Homo Digitalis

Content

Georgia Beka | European Law Students Association Athens

The centrak theme of the first presentation was law as a Problem and Solution on the Internet and net neutrality. As a theoretical basis of her speech, Ms. Beka argued that the main reason for the need for network neutrality ia that it strengthens consumer protection and protects its rights, while also preventing service providers from discriminating in order to gain a competitive advantage, as consumers do not benefit from a regime that actively discriminates between different types of internet traffic. Additionally, neutrality promotes freedom of speech and the free flow of ideas.

At the same time, the main concerns about net neutrality are connected to the fact that according to some sources, growth and innovation are discouraged, and it becomes difficult to meet the cost of increasing speed for different online services.

Regarding the efforts of states to ensure net neutrality, Ms. Beka referred to the efforts of the USA, India, but also the European Union to create the appropriate legal framework for the issue. In the case of the US, the Trump administration tried in 2018 to overturn the network neutrality rules set in 2015 by the Obama administration. In 2021, the Democratic administration issued an executive order calling on the FCC to enact Net Neutrality rules that are being repealed by the Trump administration. In India there is a stronger and stricter legal framework, as net neutrality is vital for the Indian government to protect its citizens and not be exploited. Respectively in the European Union, citizens are protected through the European Regulation 2015/2120 and the Recommendation by the Council of Europe of 2019.

In conclusion, the speaker stated that it is in the interest of every healthy state to establish oversight mechanisms to safeguard the core of democracy. The regulation in the US has changed more in recent years, while the EU has formed a regulation with greater

coherence and stability, and at the same time leading technology companies have formed a powerful coalition to defend net neutrality.

Asked by the unit's coordinator, Mr. Vitorato, about how much the Big Tech coalition really ensures network neutrality, Ms. Beka said that they are definitely a model and promote the idea of net neutrality, but emphasized that they are missing specific proposals for any substantial change.

George Yannopoulos | Associate Professor of Legal Informatics, National and Kapodistrian University of Athens

The second presentation on the topic focused on Platforms and their Settings. Mr. Yannopoulos referred to several EU Directives and legal instruments that over the years aimed at regulating online platforms, namely:

- E-Commerce Directive (2000/31): "There is no liability" of the Platforms

Regarding Personal Data:

- GDPR 2016/679
- "Police" 2016/680
- Instruction for passenger data PNR 2016/681

Regarding Copyright:

- Copyright (2001/29)
- Enforcement (2004/48)
- Databases (96/9)

Then Mr. Giannopoulos mentioned the basic elements of some crucial legislative texts regarding the regulation of platforms.

Existing Instructions and Regulations

- DSM (Digital Single Market 2019/790): Disclaimers regarding legal liability do not apply to copyright issues, therefore providers should investigate if the content has any copyright issues
- P2B (2019/1150 Platforms for business users): Importance of informing about the terms of classification of services

- DCDS / DSG (2019/770 Digital Content / Services - 2019/771 Sale of Goods): Platforms can be considered marketers as long as they provide content/ services

Legislative Proposals

- DSA (Digital Services Act -Com 2020./825): Amendment of Dir. 2000/31 / Obligation to take action / Provision of information / Provision of a national coordinator / Obligations of care when the platforms have more than 45 million users
- DMA: (Digital Markets Act - Com 2020/842) Establishes obligations of access regulators
- DGA: (Digital Governance Act Com 2020/767) Sharing public sector data
- AiA: (Artificial Intelligence Act Com 2021/261) Establishes Rules for Prohibited Practices in Artificial Intelligence

The speaker concluded that we should try to answer critical questions about the platform setup issue. For example, do we need so much "over-regulation"? If so, then we need to decide who should enforce it, discuss governance issues and the need for a regulator. If not, we need to propose other control methods and gain more confidence in new business models. In short, the second presentation came to the question of whether there should be, in the end, control or freedom of provision of services.

The main question asked to Mr. Yannopoulos by the moderatorMr. Vitoratos concerned the issue that arises when providers delete content due to fear that it will not follow the instructions. Mr. Giannopoulos referred to this as a "chilling effect", which happens when the provider prefers to remove content (a move that can be considered censorship if in the end there was no issue of intellectual property) and spoke about the problem of self-regulation of such issues by the quasi "judicial" bodies of large companies. As a solution to the problem he proposed the strengthening of the legal departments of large companies to reduce this chilling effect.

Lefteris Helioudakis | Homo Digitalis

Mr. Helioudakis' presentation analysed the relationship between European legislation and business models based on discrimination, polarization and monitoring. Mr. Helioudakis presented to the public the concept of the commercialization of our digital self and the social and psychological consequences it has on individuals. Reference was made to online environments (e.g. chatrooms) that have been examined by researchers since 1994 due to the concern that they absorb our personality and poison our soul and our relationships. These chatrooms present strong signs of discrimination, polarization and surveillance.

Regarding the effect of supervision in such environments, Mr. Helioudakis argued that it can not always cope with all the issues that arise due to its high workload and therefore

more resources and expertise are required. Finally, the importance of Civil Society in the issue of discrimination, polarization and monitoring on platforms was highlighted.

Ioanna Noula | Internet Commission

The main theme of the fourth presentation on the topic of Law was corporate accountability and the European Digital Services Act. With a brief overview of the power of companies and politicians in the world of rapid digital transformation, Ms. Noula recalled the common demographic characteristics of those at the top of these organizations (age, gender, background).

The Internet Commission's focus is not on entrepreneurship, but on the culture and education of the people who built these companies. References were also made to individuals who bring to light issues of abuse of power by such companies (eg Frances Haugen over the Facebook scandal).

Also, in her presentation, Ms. Noula presented the fundamental rights that must be defended in the technological revolution, such as: Rights of security, freedom of speech, privacy, right to be forgotten. The problem that has arisen in recent years is that of adhoc governance and the creation of a vicious circle of trust we show in companies: a shake-up of trust, a lack of digital transformation and a regulatory framework. Of course, there are in fact large companies that are interested in their corporate responsibility and the implications of their company's digital transformation.

The Digital Services Act assigns responsibilities to intermediaries, ie platforms, to manage their systemic risks and to be subject to external and independent audits (Article 28). The questions that have arisen about this article are:

- What can be the independent audit authority?
- How can the independence of such a body be guaranteed?
- How will the authority be accredited, empowered and strengthened?

In the ways we can eliminate this vicious circle of lack of trust in companies that has been created, Ms. Noula proposes the strengthening of digital responsibility beyond transparency (reports), a procedural accountability (how algorithms are built, how decisions are made). Reference is also made to the dynamic evaluation process, to the research, to the evaluation, to the deep understanding of the issues by the companies themselves and of course to the public debate that needs to be built. Leading organizations are willing to be evaluated and Ms. Noula's team has developed a database of good and bad practice for the development of benchmarks and codes of conduct for companies.

Asked by Mr. Vitoratos whether companies are required to comply with these corporate responsibility practices and submit to the evaluation presented, Ms. Noula said that large companies are not always willing to accept their digital responsibility.

Policy Conclusions and Suggestions

- It is in the interest of every state to establish oversight mechanisms to safeguard the core of democracy
- Regulation in the US has changed more in recent years, while the EU has developed a more coherent and stable regulation
- Leading technology companies have formed a powerful coalition to defend net neutrality
- Is there control over the setting of platforms or should there be free movement?
- Strengthen resources and specialization of supervisors for issues of discrimination, polarization and monitoring that occur on platforms
- The questions to be answered by the community regarding the supervisory authority proposed in Article 28 of the Digital Services Act are:
  - What can be the independent audit authority?
  - How can the independence of such a body be guaranteed?
  - How will the authority be accredited, empowered and strengthened?

Epilogue

In recent years, the debate over the need to regulate digital platforms - increasingly popular and with a significant impact on society - has become necessary. Many cases of abuse of power by technology companies, which deny their digital responsibility, have come to light and society is called upon to limit the negative consequences of specific decisions and platform algorithms. As the speakers of the topic "Law and Internet" at IGF Greece 2021 mentioned, the road to a more fair internet is not easy and the competent bodies are not always willing to make the necessary changes and submit their services to review by some independent authority.

The user as a consumer

Details

- Discussion format: Presentations
- Speakers:
    - Alexis Nikolaidis, Association of Businesses & Industries (SEV), Associate Advisor
    - Vicky Tzega, EKPOI.ZO, Legal Advisor
    - Apostolis Aivalis, AIVAL.COM, Managing Partner & KNOWCRUNCH.COM, Syllabus Manager
    - Vassilis Karkatzounis, Lawyer specializing in New Technologies
- Moderator: Vassilis Vassilopoulos

Introduction

The main theme of this discussion concerns the way in which digital platforms and their respective companies address their users as consumers of their products and services. The axes around which the presentations revolved were related to the use of various platforms and tools of social networking and digital content, internet advertising (the so-called adtech), the customer experience in this "4th Industrial Revolution" and the actions of various consumer associations in the context of the protection of privacy but also the interests of consumers. The presentations drew useful conclusions regarding advertising, privacy, the free or non-use of digital tools and how users can use the internet and its services safely. The issues of commercial use of navigation data for advertising and business purposes as well as revenue streams for companies providing online platforms are crucial in the light of Internet Governance, as they promote discussions that seek a balance between the economic viability of the internet but also consumer protection and privacy.

Content

Before the speakers took the stage, the moderator Mr. Vassilis Vassilopoulos made a brief introduction to the topic of the user as a consumer. Referring the new way in which companies' advertising campaigns are carried out, he raised the issue of the processing of personal data, preferences and behavioral data of users. In addition, he expressed the concerns of the European Union regarding the intervening operation of companies that provide digital platforms that process personal data. Finally, he introduced the issue of the user as a consumer on the internet and related platforms, citing the diverse presence of speakers, who, representing different aspects of the issue, managed to approach it globally.

Apostolis Aivalis | Managing Partner, aival.com

The line of presentations was opened by Mr. Apostolis Aivalis, Managing Partner of AIVAL.COM and Syllabus Manager of KNOWCRUNCH.COM. For the last 25 years he has been active in the field of digital business as a strategist and the main focus of his presentation concerned the user and the many different platforms in which he operates. To begin, Mr. Aivalis referred to a concept introduced by Mr. Vassilopoulos at the beginning of the subsection, namely the expression "We are the product". Specifically, Mr. Aivalis underlined that the economic model that prevails in social networking and content platforms is free of charge or at least mostly free services in exchange for users making their personal data available to third companies for advertising purposes.

During his presentation, Mr. Aivalis suggested some guidelines in order to use digital platforms fairly, safely and easily. Firstly he observed that with proper training, all users will have a better understanding of the digital ecosystem, both in terms of technology and finances. In addition, he suggested that more emphasis be placed on accessibility between content display technologies, as this has become commonplace as different technologies evolve but do not work. In addition, he mentioned the need for a change in data protection models and the need to switch to their management at device level. After his presentation, Mr. Aivalis received questions from the public. Initially, clarifications were requested on the process of providing or selling data to advertising companies through social media and what applies to sensitive personal data management policies. Mr. Aivalis clarified the issues raised and stressed that the control carried out on social media platforms is thorough. Then, a remark was made about the opacity of the terms of use of a well-known social media platform, and Mr. Aivalis replied that the personal data protection authorities are doing their job properly and are strict, however there should be universal control, without showing preference to certain companies. Finally, after a question from the public, the speaker clarified that a subscription to a platform which generates profit through the collection and sale of data, does not imply the discontinuation of data for advertising purposes.

Vassilis Karkatzounis | Lawyer and PhD Candidate

As a lawyer specializing in New Technologies and a PhD candidate in the Department of Information and Communication Systems of the University of the Aegean, as well as a co-chair in the Greek branch of the International Association of Privacy Professionals (IAPP), the presentation of Mr. Karkatzounis regarding AdTech, and in particular the present and the future of internet advertising was crucial. Mr. Karkatzounis started by making some remarks about the regulation of online advertising, emphasizing in many cases a company's profit is not intertwined with its compliance, since its competitive advantage goes against it. Given the significant shift from traditional to digital media, the speaker

enumerated the main forms of internet advertising, namely the case of walled gardens and the case of real-time bidding Then, Mr. Karkatzounis spoke about the characteristics that user consent must have and how it is regulated by law. Regarding the future of advertising and how technology provides the solution, the speaker mentioned new technological solutions that adapt to the volatile model of today, referring to FLoCs, a technology that does not use existing third party cookies. The presentation closed with questions about the future of online advertising, such as how to balance competition and protect privacy. Finally, there were comments and questions from the public, regarding the protection of privacy (data protection 'by design' and 'by default') along with democratization, which according to the speaker is not easy to achieve.

Alexis Nikolaidis | Associate Advisor, SEV

The next presentation was delivered by Mr. Alexis Nikolaidis and was about the customer experience during the 4th Industrial Revolution. The speaker opened his presentation by analyzing the change in business model towards B2C (Business to Consumer), with the consumer being more informed and with more expectations. The key steps mentioned by the speaker as the prerequisites in order for companies to meet the needs of the consumer are the digitization of the experience, the coverage of all the contact points to the customer and the company but also the utilization of big data with the use of analysis tools. Mr. Nikolaidis underlined that companies must adapt more to the needs of the customer and provide the best customer experience since this is the main field of competition nowaday. He went on to mention some challenges that arise, such as the ever-changing consumer behavior, which requires flexibility on the side of companies, the need for personalization, covered through a central profile for each user, the existence of old technological infrastructure and the need for upgrading and interconnection with the new ones , but also the need for communication of the customer-centric management at all levels of the company. The field of technology has seemed to provide the solutions and the digital experience seems to be yielding significant profits for businesses. Finally, he presented the roadmap for the transition to the new digital experience. During the QnA session at the end of his presentation, issues such as the comparison of Greece with other countries in terms of the adoption of digital experiences by companies, the value of the human factor as well as the inclusion and targeting of customers in products and services were addressed.

Vicky Tzega | Consumers Union EKPOIZO

The last presentation was that of Ms. Vicky Tzega, who is a lawyer specializing in corporate law and contracts and a Legal Advisor at EKPOI.ZO. Firstly, Ms. Tzega emphasized the value of involving civil society in dialogues on digital development and consumer protection awareness in general. Then, Ms. Tzega briefly explained what EKPOIZO is, as well as what

means and areas of action it follows. In the context of the needs of the modern digital age, the speaker analyzed the actions of EKPOIZO, which relate to various areas, such as online shopping, billing, consumer data protection, unfair commercial practices, obscure standards, protection from inappropriate content, online surveillance and more. The conclusions drawn from the actions demonstrate, inter alia, the need for further education of consumers about their rights, and the realization that users and their rights are at risk of unfair commercial practices. Ms. Tzega proposed training campaigns, counseling and the introduction of a more targeted legal framework as measures to improve the situation. Finally, during the questions and comments, she called for the faster and more efficient trial of cases concerning consumers, but also referred to electronic mediation and the relevant actions of E.K.POI.ZO.

Policy Proposals and Conclusions

- Changes are needed regarding the management of data on internet platforms
- The economic viability model of the platforms after the changes must be carefully considered
- It is important to always take into account the human factor and the consumer to be at the center of the design
- Education and awareness-raising are key drivers of Internet service development and advertising

It is important to take into account in the policy-making process some risks that may arise, some of which are the following:

- Transparency in the management of personal data on the part of companies is a key problem
- The technical infrastructure may not be ready to accept the change to more secure and efficient data management technologies
- Legislation may not be targeted or efficient enough to handle infringement cases

Epilogue

The issue of the coexistence of consumers and businesses in the digital world is of particular importance, as economic development affects the technological, legal and political context of internet governance. It is certain that we will see numerous changes in this context in the coming years, rewarded by the change in the behavior of both consumers and companies that provide services in the field of internet.

Digital Transformation

Section Details

- Discussion format: Panel discussion
- Speakers:
  - Leonidas Christopoulos, General Secretary of Digital Governance and Simplification of Procedures, Ministry of Digital Governance
  - Stella Tsitsoula, RED.comm
  - Giannis Charchantis, Infinity Greece
  - Manos Margaritis, Qualco
  - Dimitris Varoutas, Department of Informatics and Telecommunications EKPA
- Coordinator: Ismini Kriari, National Committee on Bioethics and Technoethics

Introduction

The digital transformation of Greece has accelerated due to the pandemic, which has forced many Public Sector, Private Sector and Civil Society organizations to strengthen their digital presence. At the same time, issues of lack of digital skills and security arose. The question of the security of digital transformation was in fact a proposal for a discussion submitted during the Call for issues by part of the IGF Greece community. Internet Governance is inextricably linked to digital transformation, as it focuses on Internet policies, which are the means by which society has the opportunity to enjoy the benefits of digital advancement.

Content

The discussion was started by the General Secretary of Digital Governance and Simplification of Procedures of the Ministry of Digital Governance, **Mr. Christopoulos**, who stated that digital transformation is a force of social and institutional transformation with direct practical implications and applications. Its implementation requires both clear planning and sincere political will. The first step requires the simplification of procedures, which can then be digitized with greater benefit to the citizen. The aim is not to digitize the existing bureaucracy, but to improve the procedures, which will be available electronically. An important factor in the digital transformation of the Greek Public Sector was the administrative adjustment that aimed to bring an end to the anarchy of digital services (which were offered by various public organizations), and has been achieved through the transfer of responsibility of digital services to a central authority, thus "breaking" administrative silos and reducing resistance to change.

The pandemic certainly accelerated digital transformation and it was observed that the various Public Organizations and their employees were receptive to the changes. Citizens

saw a lot of new online services become available in a short period of time. Indicatively, out of the 502 electronic services in March 2020, the citizen could use about 1300 services in November 2021. The methodology of delivery of electronic services moved to more but small in terms of resources required and the date of delivery, logical which was particularly far removed from the delivery of almost entirely large IT projects with a more distant implementation horizon. The overall project of Public Digital Transformation must be sustainable and dynamic so that it does not fade.

The future of digital transformation in the Greek Public Sector includes more services through gov.gr, a mechanism for measuring and evaluating actions to reduce bureaucracy, the rapid absorption of resources for digital solutions and the improvement of citizens' digital skills. Greece, like other countries, must adapt quickly to technological developments and have permanent structures and mechanisms that will assist in the digital leap.

The discussion continued with the contribution of **Mr. Margaritis**, who focused on the digital transformation of the private sector, which experienced within 6-7 months changes that would otherwise require 6-7 years to be realized. According to the speaker, companies that better understood their customers' data certainly had a significant advantage. For example, many physical stores needed to pay more attention to the customer experience in their digital store (which may not have existed and needed to be created amidst the pandemic). At the same time, business executives had to take greater account of feedback from technology experts but also to locate employees either from within the movement or from the wider labor market that would help the company cope with a technologically competitive environment. A company must monitor and adapt to new business models with a strong digital character, in order to remain competitive but also to intensify its investments in IT solutions. Such solutions can be the use of cloud technologies, which among other things allows a smoother work-from-home system for employees.

In order to remain successful, companies must emphasize on the data they keep, gathering and homogenizing it in such a way that they are able to utilize it. At the same time, efforts must be made in the areas of digital security, both on the basic level of general infrastructure, as well as regarding the protection of the individual employees, who now partially work from home. The mental and physical health of the employee must also be a priority and a contribution of the company to the wider society. The changes brought about by the pandemic are here to stay, and the lessons learned by individuals and organizations must be used in the post-epidemic era as well.

Civil society organizations also faced significant challenges due to the pandemic, with the digital transition appearing as the almost exclusive possible solution for continuing their activities, said the third speaker **Mr. Harhantis**. However, the majority of organizations did not have the digital infrastructure that would allow them to continue working with volunteers but also to continue their activities without interruption. At the same time, there

was limited funding mainly coming from private entities, as they also faced issues of digital survival. Thus, the organizations were found to be struggling for their survival. Beneficiaries of voluntary actions encountered difficulties in accessing such actions, even if they were provided online, since it is wrong to assume that everybody would have the technological background to take part. In conclusion, all actors need to realize the importance of having support and training in both organizations and individuals in terms of their digital skills.

Ms. **Tsitsoula** took the floor stating that the digital "spring" in many areas was accompanied by an increase in digital risk for individuals and organizations. For example, companies were not fully prepared for the continuous work of people from home, both in terms of secure software and in terms of available corporate devices (eg laptops). Threats such as ransomware were also felt in Greece, with more than 60 organizations, including the Municipality of Thessaloniki, being attacked during the pandemic. With the ultimate goal of protecting data and money, there is a need to create a culture of digital security with continuous efforts and strengthened infrastructure for the whole age range.

Finally, **Mr. Varoutas** stated that all digital solutions become a reality through the existence of durable telecommunication networks. In our country there was recently an auction for part of the 5G network range, a development that comes to meet the growing need for wireless networks. Broadband should be a universally available feature and one of Greece's priorities. Legislative efforts such as the EU Digital Services Act, Digital Market Act, Data Governance Act and the Artificial Intelligence Act are also important factors in improving digital reality.

Conclusions and Policy Proposals

Based on the positions of the speakers and the discussion that followed based on the questions of Ms. Kriari, the following proposals emerged:

- Continued commitment towards enhancing the digital transformation in the Public Sector, thus creating the digital state of the future
- Consolidation of the digital element as a key pillar of entrepreneurship of any kind
- Support and education of the citizens regarding digital skills for the purpose of digital inclusion.
- Establishing a culture of digital security in society as a whole
- Creation and development of a legislative framework that will intensify digital progress, while protecting the rights of citizens.

Epilogue

The degree of evolution of the digital transformation of Greece has great importance, as it has the ability to determine to some extent the prosperity of the country. For example, a country with strengthened digital governance structures is more attractive for investors, while companies that operate with and promote digital innovation have the opportunity to play a leading role internationally. As an evolving phenomenon, digital transformation is of particular interest for the study and application of innovative practices.

Environment and the Internet

Details

- Discussion format: Presentations
- Speakers:
    - Zacharoula Andreopoloulou, Department of Agriculture, Forestry and Natural Environment, Aristotle University of Thessaloniki – Academia
    - Ioanna Kostarella, School of Journalism and Mass Communication of the Aristotle University of Thessaloniki – Academia
- Moderator: Stelios Kavvadias

Introduction

Many countries today are establishing "green" policies aimed at tackling global warming and pollution caused by human activity. Modern technological advancements allow us to analyze in depth the causes of climate change, but also to act to reduce some of the damage that is or is going to be caused by it. The Internet holds a special place in the global effort and is the medium that connects the scientific community, citizens, businesses and decision makers.

The interaction between the environment and the Internet is an issue that is of constant concern to the global Internet Governance community, which is looking for ways to continue to exploit the positives offered by the Internet, while at the same time reducing the damage to the environment from the materials and non-physical components of the Internet.

Content

After all, how green is the Internet? | Zacharoula Andreopoulou

Ms. Andreopoulou analyzed the important question of whether the Internet, with the new opportunities it offers and the energy requirements it presents, supports or complicates a "green" transition.

Today the Internet is everywhere (home, work, travel) and at very high speeds that allow uninterrupted use and access to innovative products and services. Systems that leverage the philosophy of the Internet of Things are examples of digital innovation that can be used

for sustainability while being in line with the strategies and funding mechanisms offered by the states.

The Green Internet is an outstanding ally for the implementation of the 17 Sustainable Development Goals set up by United Nations, since it is a factor that can contribute inter alia to the protection of the biodiversity, the decrease of the energy consumption, the increase of the energy efficiency and the circular economy, which constitute areas of the wider European Green Policy.

In other words, the Internet is at the service of the environment, and together they create new dimensions in existing technologies, such as Green E-commerce over conventional e-commerce, Green Banking, Green E-Government and more. At the same time, the Internet enables the awakening of citizens' environmental awareness, through the dissemination of information on issues and policies that are implemented or are being developed.

A great source of information is the implementation of integrated environmental management consisting of systems for the collection and processing of environmental data. Such practices allow the creation of forecasting models, the consideration of alternative scenarios, and the making of decisions based on collected data in order to protect ecosystems and save resources. Areas of application of such practices include real-time forest surveillance, drone use for natural disaster management, land conservation savings, optimal water and irrigation management, supply chain monitoring and energy sustainability (e.g. smart grids, energy certificates). Another important development is the spread of cloud technologies because they provide significant energy savings without degrading the services provided by utilizing existing networks and achieving virtual distributed computing power and real-time storage.

The aforementioned developments coincide with the explosion in the number of active internet users that reached 4.57 billion people in 2020, ie 59% of the world's population. However, this heavy use is accompanied by environmental pollution and more specifically in 2% of the total emission of pollutants from information and communication technologies, a percentage equal to that of aviation. Environmental problems are exacerbated by the high toxicity of the products produced and the improper management of e-waste, as well as the energy-intensive use of the Internet - especially since energy consumption is projected to quadruple in 2022 compared to 2017. This is why,big corporations in the technology sector should act and become more "green", regarding both how much energy they consume and the way the energy has been produced (e.g. renewable sources), while at the same time they manage in an environmental friendly way the materials they use.

The Internet, Digital Tools and the Environment | Ioanna Kostarella

Ms. Kostarella continued the discussion on the relationship between the internet and the environment, drawing the public's attention to digital tools that can support environmental efforts.

The Internet has the potential to raise awareness of the environment and sustainability as it is a universal medium. The environment is of particular importance to all humanity since there is no "Planet B", while at the same time it is an integral part of our daily lives. There is a growing global mobility to protect the planet as evidenced by conferences such as COP26 and the United Nations Sustainable Development Goals. In this regard, substantial commitments must be made and accompanied by action in order to intensify the fight against global warming.

The speaker stressed that the Internet gives citizens and journalists access to knowledge and information about the environment, thus bringing Civil Society to the forefront and strengthening its voice. Stakeholders (e.g. citizens) first encounter the question of the availability of the environmental data they seek. Many times, there is not enough time, organization or even knowledge about where and how one can search for information. It is nevertheless worth emphasizing that there is now a wealth of information available on the internet from which value can be extracted from and to citizens. This information can be in the form of open data on the environment, be it in quantitative or qualitative form and act as a basis for transparency and decision-making.

There is also a legal framework that allows citizens to request information from public bodies such as studies, statistics and other data. Ideally, the collected information can take the form of infographics so that they can be communicated and more easily perceived by the general public.

Some of the data sources that can be used by citizens are:

https://opendata.ellak.gr/

https://vouliwatch.gr/

https://www.copernicus.eu/el/ypiresies/atmosfaira

https://app.electricitymap.org/map

Conclusions and Policy Proposals

- The Internet is a powerful tool in the context of strategies for environmental protection, sustainability and tackling climate change .

- The green policies of the Green Agreement must be implemented, both by the industry that must become sustainable and by every citizen.
- Civil Society has at its disposal a wealth of information and the legal framework to identify it and use it to improve the environment. The Internet is the common medium that allows the above actions.

Epilogue

The Internet is certainly a very useful invention that is accompanied by multiple benefits and has a key contribution to technological and social progress. Also, environmental protection continues to be a priority for most societies as they experience the negative effects of climate change. There is no doubt that a "Green Internet" can be an answer/ solution to the growing environmental issues that concern humanity. In this context, we must make the most of the available wealth of information but also seek changes that have given a greener character to the Internet.

Workshops

Within the framework of IGF Greece 2021, parallel Workshops were organized, with participants deepening their knowledge on specific topics of the conference and approaching them in a more practical and interactive way. No prior knowledge of the individual topics was necessary for participation in the Workshops.

The Workshops are listed in detail below.

From ideation to implementation: How to get your idea online

Organizers: Elpida Vamvaka (Papaki, Homo Digitalis), Giorgos Angelopoulos (IpHost) & Konstantinos Chatzistamou (EURid)

During the workshop, the audience learned step-by-step how to implement an idea in the digital world and how to choose the right domain name, depending on where the product or service is addressed. The speakers highlighted mistakes that are often seen when a company or an individual want to launch their idea online, and gave insightful advice on how to effectively proceed with the process of purchasing, designing and publishing a website. The workshop used specific examples of good or bad practices and was strongly based on audience interaction and discussion. Participants also played online games and the winners of the games won prizes, such as their own domain name for free for a year.

The Greek innovation system

Organizer: George Karamanolis (Crowdpolicy)

The workshop leader presented valuable information on how innovation operates and is fostered in Greece, and in particular how different public and private programs aim at enhancing Greek innovation and entrepreneurship. The speaker extended on several services and initiatives aimed at enhancing internet governance and innovation in Greece, as well as lessons learned as part of different actions initiated by Crowdpolicy in this field.

Additionally, Mr. Christos Tsetsis (Crowdpolicy) conducted a short presentation on the Blockchain and the technologies that enable it, following up with answers to questions from the audience.

Internet access and timely information for people with refugee and migrant background in Greece

Organizers: Nikolas Panagiotopoulos, Katerina Pronoiti, Maro Verli, Mohammad Kabbani (Refugee.info)

The workshop focused on interactively presenting the issue of Internet access and access to accurate and timely information for people with refugee and migrant background in Greece. Through simple examples and simultaneous browsing of websites provided by Greek authorities from the perspective of someone who does not speak Greek, the presenters highlighted all the difficulties faced by people who need to be informed or interact with Greek state websites. In particular, the organizers showed that despite putting a lot of effort, mismatched websites, bad interpretations of concepts and a lack of understanding for the urgent needs of non Greek-speaking populations deepen the divide between the local population and vulnerable groups, in particular during times of crisis or uncertainty, such as the COVID-19 era. Finally, the speakers shortly presented the work and methods of refugee.info, a platform aimed at specifically combatting such difficulties and providing correct and timely information to population in need of these details in their native language.

From Jules Verne to the post-truth era and meta social media - The importance of critical thinking

Organizer: Panagiotis Kakolyris (COO & Head of Strategy Socialdoo - Member of the Academic Council of KMOP)

During the workshop the challenges of misinformation in the emerging digital environment were elaborated upon, and the speaker presented the main channels and mechanisms that characterize the era of social media and quick access to (true or false) information. In addition, there was a discussion with the participants on the possibilities of user shielding and tools from European projects such as Youth MythBusters and COMMIT aimed at combating misinformation.