Comunicación y Sociedad
Departamento de Estudios de la Comunicación Social
Universidad de Guadalajara

PRESENTATION

Communication in the Age of Artificial Intelligence: Creation, Reproduction, and Perception in the 21st Century

SILVIA MAGRO-VELA
https://orcid.org/0000-0002-0695-8813
NURIA NAVARRO-SIERRA
https://orcid.org/0000-0002-1431-1534
LAURA GONZÁLEZ-DÍEZ
https://orcid.org/0000-0003-1209-8845

It is no longer novel to highlight the growing interest in artificial intelligence (AI) and, consequently, research in this field. Its transversal nature has allowed many disciplines to benefit from AI since the earliest stages of its development. In recent years, the expansion and popularization of AI have driven profound transformations in the field of communication and most of its areas of specialization. This process transcends mere technological advances, shaping a sweeping and deep transformation of creative and production methods that influence models of creation, distribution, and consumption of content.

One of the latest indicators of this process is a PwC report (2023), which estimates that AI could contribute up to 15.7 trillion dollars to the global economy by 2030, with a significant impact on creative industries, especially media and entertainment. Similarly, Deloitte (2024) points out that more than 60% of media companies are already

1 Universidad Rey Juan Carlos, Spain.
silvia.magro@urjc.es
2 Universidad Rey Juan Carlos, Spain.
nuria.navarro.sierra@urjc.es
3 Universidad San Pablo-ceu, Spain.
design@ceu.es

Comunicación y Sociedad, 2025, pp. 1-8.

using AI tools in their production processes, and this figure is expected to exceed 85 % in the next three years.

The impact of this transformation is not without debate. Even before its popularization, authors such as Carr (2010) warned about the potential risks of extreme automation. Other interpretations, like those of Castells (2009) and Harari (2016), see technology as an opportunity to democratize media production, heralding significant changes in the concept of human creativity and authorship. This debate, especially in its technological dimension, finds precedents in Walter Benjamin's (2017) influential 1936 essay *The Work of Art in the Age of Mechanical Reproduction*.

In this context, a persistent tension between the suitability, adaptability, and inherent difficulties of implementing new technologies during their initial phases emerges. While the first steps towards a regulatory framework were already taken with the enactment of the European Artificial Intelligence Regulation in 2023, significant challenges remain at the international level to achieve effective legislation. This regulation must address the risks associated with the use of artificial intelligence in professional environments and ensure its alignment with appropriate ethical practices. Recently, Magro-Vela and Navarro-Sierra (2024) addressed these dilemmas from a contemporary perspective, analyzing not only the benefits and ethical challenges of AI but also the legal debates related to the need for a regulatory framework that ensures responsible use.

At this point, it can already be asserted that the introduction of AI in audiovisual communication transcends its reading as a technological trend, belonging more to a paradigmatic shift that reorganizes the interaction between creators and audiences. This interpretation is supported by the concepts of *technological* and/or *informational revolution*, as defined by Fang (1997) and Kovarik (2015), and, in the audiovisual sector, it is posed in terms of automation and redefinition.

In this sense, content creation in all its phases –from scriptwriting to the generation of static and dynamic images– has begun to experiment with AI tools to create pieces that aim to compete with those traditionally produced in the audiovisual market, as noted in the exploratory study by Magro-Vela et al. (2024). Thus, this marks just the beginning of the

inclusion of these technologies, which seem to permeate virtually all functions and sectors, where they not only perform mechanical tasks but, as highlighted by the Journalism Lab of the Fundación Luca de Tena (2024), also work on content personalization in the communication field.

Finally, concerns surrounding AI are also evident in academic research. A simple search of titles, keywords, and abstracts in Scopus-indexed papers yields a total of 213 890 articles published up until early December 2024 in journals across all fields of knowledge, without restricting by language or access. This figure excludes other repositories, research contributions, and those currently in progress, offering a glimpse of the magnitude of this unfolding phenomenon.

Integrating into this trend, this special issue is the result of the work of 12 authors, who, through five investigations, present some pieces of the complex mosaic that AI represents at this moment, affecting technological, creative, regulatory, and even philosophical aspects. Thus, this thematic section seeks to create a conceptual map that helps to understand this new scenario in which Artificial Intelligence emerges as a key player that redefines traditional ideas of what it means to create, communicate, or to be an author.

In the first article, titled "Impact of Generative Artificial Intelligence on the efficiency, quality, and innovation in the production of Open Educational Resources for MOOCs", Alejandro Carbonell-Alcocer, Alberto Sánchez-Acedo, Nerea Benítez-Aranda, and Manuel Gertrudix explore how Generative AI can optimize the creation of Open Educational Resources (OER) for MOOCs. The research focuses on two European Union-funded projects: CRESCent and DOMINOES, developed between 2020 and 2023. The methodology involves a comparative study of the production processes of both MOOCs, using a specific analysis sheet to evaluate over 120 audiovisual and multimedia products. While CRESCent did not use generative AI tools, DOMINOES integrated them into all production phases.

The results indicate that incorporating generative AI significantly increases the efficiency and technical quality of OER. In DOMINOES, AI allowed for more adaptive and interactive content, enhancing image definition, voiceovers, and semi-automated avatars. Additionally,

production time and costs were reduced, enabling the adoption of more complex and accessible creative practices. In conclusion, the research validates that generative AI not only improves the efficiency and quality of OER, but also fosters innovation in MOOC production, highlighting its disruptive potential and low-cost accessibility for creative processes.

Secondly, we encounter the research titled "The urban visual culture through generative Artificial Intelligence: Spectacle and embellishment in Cordoba city, Argentina", by Pablo Corzo. This paper explores the intersection between generative artificial intelligence (GAI) of images and urban visual culture. The research focuses on the processes of strategic beautification and spectacularization in the city of Cordoba (Argentina), using MidJourney technology.

The methodology combines qualitative approaches and digital methods. Content analysis and the open-source software Fiji are employed to examine a set of 88 photorealistic images generated by GAI. These images were obtained through a standardized prompt in English, ensuring consistency in visual generation. The results highlight the predominance of historical and architectural urban references in the images, particularly cathedrals and traditional buildings. Additionally, a low degree of humanization is observed, as only 30% of the images show human figures, generally small and in the background. Most of the images display wide shots and normal angles, with predominant natural lighting.

The study concludes that the images generated by GAI reflect and amplify the processes of beautification and spectacularization in the city of Cordoba, creating a homogeneous and unproblematic visual representation. These images, although photorealistic, simulate an idealized reality devoid of social complexity, leading the author to argue for a critical analysis of these emerging technologies and their impact on urban visual culture.

Next, the article "Divergences in the use of generative AI among sports journalists in Spain" authored by Fernando Olabe Sánchez and Félix Arias Robles, addresses the application of AI in Spanish sports journalism, highlighting differences in its adoption and perception by professionals from 16 media outlets. The research is exploratory in nature and is based on a quantitative methodology, using questionnaires sent to 40 journalists from both general and specialized media outlets,

representing, therefore, a diverse sample. The study focuses on three main objectives: identifying the use of AI tools by sports journalists, determining journalists' and media outlets' behavior regarding these productive contexts, and gathering professionals' perceptions on AI use in newsrooms. The questionnaires were structured into four sections: sociodemographic variables, use of external digital tools, use of AI-based resources developed by the media outlet, and evaluation of AI use in sports journalism.

The research establishes an unequal and emerging adoption of AI among Spanish sports journalists, as only after the launch of ChatGPT in 2022 did a significant portion of respondents begin experimenting with this technology. The most common applications include idea generation, data search, and transcription, while its use for content organization, distribution, and commercialization remains limited. Finally, the authors share in their research that the main problems identified are, on one hand, a lack of understanding of AI's potential and, on the other, resistance to change, while the perceived advantages include increased work efficiency and resource optimization.

The paper titled "How are communication companies adopting AI" authored by Santiago Tejedor Calvo, Stephanie Vick Saurí, and Laura Cervi, also focuses on the integration of AI in journalism and identifies over a hundred communication companies implementing it in their activities. The research, exploratory and qualitative in nature, combines a systematic literature review with a survey of journalism experts. The methodology includes case study mapping and document collection, complemented by a questionnaire distributed to 11 communication experts.

The results reveal that 108 media outlets are using AI, with newspapers predominating, followed by television, news agencies, radio, and finally, multiplatform media. Geographically, the United States leads the list with 22 outlets, followed by Spain (14), and the United Kingdom (9). The study also highlights that among the main functions of AI in these media are text generation (46 outlets), video generation (29), trend monitoring (16), and information verification (11), the latter being considered the most useful functionality according to the experts consulted. The research also reveals that tools like Quill,

Wordsmith, and ChatGPT are common for text generation, while Wibbitz and Synthesia are used for video.

The article concludes that the adoption of AI in media is transforming journalistic routines and content production, with a significant trend toward automation and personalization. However, it notes that challenges persist in equitable implementation and the development of tools for specific journalistic functions.

Finally, the study by Jorge Alberto Hidalgo Toledo and Eduardo Portas Ruiz, titled "Productivity and creativity: exploring the use and appropriation of artificial intelligence in contemporary communication in Mexico" examines how Mexicans interact with AI tools and applications in their daily lives, and in professional and educational activities. The research, employing a quantitative approach, is conducted through online questionnaires distributed via e-mail and social media, reaching 327 citizens over the age of 13 from 17 states across the country, with higher participation from Mexico City and the State of Mexico.

The results demonstrate that the areas where these tools are most used are work and academics, with a predominantly young user profile that has a high digital predisposition, reporting a 62% increase in productivity and relying on AI for generating innovative ideas. ChatGPT is highlighted as the most common tool among respondents, used by 91% of them. Although the study does not investigate ethical or legislative aspects in depth, it does reveal a tendency for users to not disclose their use of these tools in work or study environments due to a lack of knowledge or the absence of regulations establishing usage guidelines.

In summary, the works presented in this thematic section highlight the growing influence of AI in various fields of communication. From its positive impact on productivity and creativity among users in Mexico, to the unequal and emerging adoption of AI in sports journalism in Spain, the transformation of urban visual culture in an Argentine city, and the optimization of educational resource production in MOOCs, AI emerges as a powerful and versatile tool. However, significant challenges are also identified, such as the lack of regulation and unawareness of AI's potential, which require critical analysis and careful implementation to maximize benefits and minimize risks.

Thus, the presented papers address AI within the broad context of communication, employing a variety of approaches that allow us to observe how the new communication map is being drawn –constantly evolving and still incomplete. In this way, this thematic section aims to offer insights into the impact of artificial intelligence on the communication field and, in doing so, contribute to creating a space for discussion and critical reflection on this phenomenon, which is transforming professional practices in the audiovisual world and, ultimately, the life of images in present and future society.

Bibliographic references

Benjamin, W. (2017). *La obra de arte en la época de su reproductibilidad técnica*. La Moderna.

Carr, N. G. (2010). *The Shallows: What the Internet is Doing to Our Brains*. W. W. Norton & Company.

Castells, M. (2009). *Comunicación y poder*. Alianza Editorial.

Deloitte. (2024). *Estado de la IA generativa en las empresas*. https://www.deloitte.com/es/es/services/consulting/research/estado-ia-generativa-empresas.html

Fang, I. (1997). *A history of mass communication: Information revolutions*. Focal Press.

Harari, Y. N. (2016). *Homo Deus: Breve historia del mañana*. Debate.

Kovarik, B. (2015). *Revolutions in communication: Media History from Gutenberg to the Digital Age*. Bloomsbury.

Laboratorio de Periodismo. (2024, July 16). *IA generativa: ejemplos de innovaciones en la personalización de contenidos*. Fundación Luca de Tena. https://laboratoriodeperiodismo.org/ia-generativaejemplos-de-innovaciones-en-la-personalizacion-de-contenidos/

Magro-Vela, S. & Navarro-Sierra, N. (2024). Inteligencia artificial generativa, ¿una nueva era de la imagen o un ciclo más en su evolución? In F. Segado Boj, S. Gómez García & J. Díaz del Campo Lozano (Eds.), *Investigación sobre comunicación en España: Las tendencias actuales y perspectivas de futuro* (pp. 117-128). Fragua.

Magro-Vela, S. Sánchez-López, P. & Navarro-Sierra, N. (2024). The Revolution Will Be Artificial. An Analysis of AI-generated Audio-Visual Creation. *Tripodos*, (55), 75-98. https://doi.org/10.51698/tripodos.2024.55.05

PwC. (2024). *El impacto de los impuestos en Latinoamérica debido a la adopción de la IA*. https://www.pwc.com/ia/es/publicaciones/perspectivas-pwc/el-impacto-de-los-impuestos-en-latinoamerica-debido-a-la-adopcion-de-la-ia.html