NEW IMAGES OF THE GLOBALIZED WORLD CROSSED BY ARTIFICIAL INTELLIGENCE

VANINA RODRÍGUEZ
Friedrich-Alexander Universität
vanina.rodriguez-bauer@fau.de
https://orcid.org/0000-0001-9494-4966

Introduction

Nowadays, the benefits of global and rapid interconnection are tragically linked to the intrusion of those who commercialize our usage habits into our personal screens. It is not pleasant to struggle daily through a jungle of spam, unwanted ads, and suspicious messages until what is actually happening becomes barely perceptible. Faced with such worldwide disorder, it is increasingly difficult to act proactively, access information, and communicate with one another. Those currently controlling the money and databases aim to prevent others from intervening in these areas in the future. Would that even be feasible, and if so, who would benefit from it? How does the global interdependence and its promise of facilitating communication and growth relate to the abstract concentration of financial assets and data sets? It is precisely this abstraction of banks, hoarding money and data that increasingly renders the lifeworld incomprehensible for us citizens. — Néstor García Canclini

Artificial intelligence (AI) has rapidly permeated our lives, revolutionizing the production and consumption of images and content in an increasingly globalized world. However, this transformative process is not unfolding equitably, with the "global south" at a disadvantage compared to the "global north." This disparity presents a
range of challenges and dilemmas that require comprehensive examination and addressing.

In this article, we will explore some key aspects related to AI, focusing on how this technology is impacting image generation in various fields such as advertising, cinema, science, and more. AI has become a fundamental tool, exacerbating the existing divide between those with access to technology and those without. The digital divide has become a growing concern in many parts of the world, particularly in the global south, where a significant number of people lack access to these technologies, perpetuating historical subordination to the global north's hegemony.

Moreover, AI is reshaping how images are consumed in the current globalized world. Social media platforms and other media use AI algorithms to select and display images to users, influencing their perception of the world around them. The distortion and manipulation of the world we inhabit appear akin to sequences from "Black Mirror."

A key challenge in this context is the lack of transparency in the content generation processes by AI. The opacity of these processes makes it difficult to ascertain the exact amount and type of content being generated, potentially introducing biases into algorithms and data selection available to individuals. These biases can have serious societal consequences, particularly in terms of injustice, discrimination, and inequality.

Lastly, data privacy and security pose significant challenges in using AI for content generation and selection. AI algorithms rely on users'
personal data to customize and present information, raising ethical and legal concerns surrounding privacy and individual intimacy.

In this highly complex context, we face a series of substantial obstacles that demand careful attention and rigorous approaches for resolution. The goal of achieving equitable access to AI technology and reducing the digital divide between the global north and south has proven to be a problem of great complexity, influenced by multifaceted factors. The content generation processes of AI algorithms present significant opacity, hindering the addressing of inherent biases and posing a challenge to ensuring fairness and representativeness of produced content. Additionally, regulations pertaining to data privacy and security encounter structural challenges that jeopardize effective user information protection and the prevention of data misuse. Consequently, the full harnessing of AI’s potential in this globalized world is threatened by the complexity of the issues at hand, necessitating a scientific, multidisciplinary, and collaborative approach to effectively tackle these challenges and propose viable solutions.

“The entire history of you” AI’s Impact on Global Image Consumption

"I remember everything. Everything from our first meeting to our first kiss, to... the first time we made love. Everything. Every single second, stored. Like a grain of sand, behind my left ear. Forever." - Liam Foxwell (Black Mirror C3 – S1)

New Forms of Creation and Representation

AI has enabled a superabundance of images in various fields, from the automatic generation of creative content to the enhancement of visual effects. References to the "The Entire History of You" episode of Black Mirror, where characters can record and replay their visual memories,
exemplify how AI technology could (or perhaps already is) affect visual representation, personal memory, and human perceptions.

The proliferation of Artificial Intelligence (AI) in the realm of image production has triggered a series of concerns and pessimistic outlooks in the scientific community. As AI rapidly advances in automated visual content generation and visual effects enhancement, discouraging consequences loom for human creativity and artistic authenticity.

In the film industry, the growing capability of AI to produce hyper-realistic visual effects raises questions about the future of human actors and the essence of cinematic art. The progressive replacement of human elements with digital representations could lead to the loss of emotionality and connection with the audience. As AI advancements allow for the creation of increasingly sophisticated virtual worlds and animated creatures, artistic identity becomes diluted, risking a disturbing visual homogeneity.

Returning to the aforementioned "The Entire History of You" episode of Black Mirror, which illustrates a disquieting vision of how AI technology can negatively impact personal memory and perception of reality. The ability to record and endlessly replay visual memories leads to a destructive obsession with analyzing the past. The consequences faced in this fictional scenario are related to issues that negatively affect mental health and interpersonal relationships (as the continuous revisiting of memories could generate paranoia, anxiety, and distortion of truth, etc.).

The emergence of deepfakes and AI-generated fake content poses serious threats to information integrity and trust in the media. AI's
ability to convincingly manipulate images and videos undermines the credibility of content, leading to the spread of fake news and manipulation of public opinion. As a result, society faces increasing difficulty in discerning truth from fiction in an increasingly chaotic digital world.

In this context, AI seems poised to redefine how we perceive and produce images, but it also raises a series of ethical and social dilemmas. The loss of authenticity and humanity in image production and the possibility of massive information manipulation fuel pessimism about the future of society. Unless these challenges are rigorously addressed and appropriate safeguards implemented, AI could plunge us into a dystopian future where visual reality is distorted, and trust in the truth is entirely in doubt.

**Personalization and Content Filtering**

AI has transformed the way people consume images in the globalized world, especially through social media and online platforms. AI algorithms select and filter visual content displayed to users, tailoring it to their interests and preferences. This creates a highly personalized consumption experience, but it also limits the diversity of perspectives and exacerbates filter bubbles. The aforementioned Black Mirror episode highlights how AI technology can influence one's self-perception and interpretation of reality.

The personalized content delivered by AI can lead to a reinforcement of pre-existing beliefs and preferences, contributing to echo chambers where individuals are exposed only to information that aligns with their views. As a consequence, the potential for exposure to contrasting viewpoints and critical analysis is diminished, impeding a well-rounded
understanding of complex issues. Furthermore, the increasing reliance on AI-driven content curation may lead to a narrowing of the cultural landscape, with certain voices and perspectives dominating the digital realm, while others remain marginalized or suppressed.

Moreover, the fine-tuned personalization of content through AI raises concerns about the ethical implications of data privacy and user manipulation. By continuously analyzing user behavior and preferences, AI algorithms gather vast amounts of personal data, which can be exploited for targeted advertising or other commercial purposes. This data-driven approach to content delivery also has the potential to influence users’ decision-making processes, raising questions about the extent to which individuals retain agency over their choices in an AI-mediated world.

As we navigate the implications of AI-driven personalization and content filtering, it is crucial to strike a balance between tailored user experiences and maintaining a diverse, inclusive information ecosystem. Proactive measures must be taken to promote transparency in AI algorithms and ensure that content curation does not become a tool for manipulation or reinforcing harmful biases. Additionally, efforts should be made to foster media literacy and critical thinking skills among users, empowering them to navigate the digital landscape with discernment and open-mindedness. Only through a conscientious and reflective approach can we harness the potential benefits of personalized content while mitigating its potential risks.
"15 million merits": The Digital Divide: AI's Unequal Transformation in the Global South

"It's all a sham, don't you see? Everything we do here, everything we consume, it's all just generating merits for those who are really in charge. They've got us trapped in this endless cycle, no matter how many merits we earn, we're still stuck in this prison of screens and fake happiness. There's no way out, just more screens and more merits, until they consume us completely."

The Advancement of AI in the Global North

In the global north, advanced AI algorithms are being deployed to generate creative content automatically, enhance visual effects in films, and personalize social media feeds. These technological advancements have opened up new possibilities for innovation and economic growth in the region. However, as the global north reaps the benefits of AI's transformative power, a stark digital divide emerges, leaving the global south at a significant disadvantage in this AI-driven world.

The Marginalization of the Global South

"The Entire History of You," a thought-provoking episode from the series Black Mirror, depicts a dystopian future where individuals can record and replay their memories at will. In the episode "15 million Merits," we witness a world where the vast majority of people are relegated to menial tasks, while the privileged few indulge in a digital existence of constant entertainment.

The digital divide in AI's transformation is not merely limited to entertainment and memory capturing but extends to other crucial areas. For instance, AI-driven applications are increasingly utilized in the global north's medical and scientific research, leading to groundbreaking discoveries and improved healthcare. Meanwhile, the global south struggles to access basic healthcare services, let alone AI-
driven medical advancements. This stark contrast in access to AI technologies widens existing inequalities and reinforces the marginalization of the global south.

-Reinforcing Socioeconomic Inequalities-

The AI-driven image production and consumption in the global north perpetuate the hegemony of developed economies, creating a vicious cycle of socioeconomic disparities. As AI algorithms shape the content displayed on social media platforms, they reinforce the global north's cultural dominance, overshadowing the diverse voices and perspectives of the global south. Moreover, the algorithms often cater to the preferences and interests of users in the global north, neglecting the realities and aspirations of those in the global south.

The consequences of the digital divide are not limited to the creative sphere but also extend to employment opportunities and economic growth. While the global north witnesses a surge in AI-related job opportunities and economic benefits, the global south faces job displacement due to automation and a lack of investment in AI-driven industries. As a result, the digital divide exacerbates existing inequalities, hindering the global south's potential for inclusive economic development.

The unequal transformation of AI in the global south perpetuates disparities, stifles creativity, and reinforces socio-economic inequalities. The advanced AI technologies in the global north pave the way for innovative image production and consumption, while the global south remains marginalized and excluded from the benefits of this digital revolution. The references to "15 million Merits" from Black Mirror
serve as a cautionary tale, warning us of the potential consequences of an unchecked digital divide. To achieve a more equitable and just AI-driven world, concerted efforts are needed to bridge the digital gap, ensure access to AI technologies, and foster inclusive development in the global south.

“Nosedive” AI algorithms and their Influence on perception in a Globalized World

"I mean, everyone’s faking it all the time. Nobody’s really honest. I mean, about anything. I’m really honest, and that’s my downfall, you know.” - Lacie Pound (Black Mirror, Season 3, Episode 1 - "Nosedive")

The Rise of AI algorithms in shaping perception

Artificial Intelligence (AI) algorithms have become ubiquitous in the digital landscape, significantly impacting how information is presented and consumed in a globalized world. These algorithms play a central role in curating content on social media platforms, search engines, and news websites, tailoring it to individual preferences and interests. As a result, AI algorithms shape users’ perception of the world around them, influencing their beliefs, attitudes, and behavior.

The Black Mirror episode "Nosedive" provides a striking portrayal of the influence of AI algorithms on perception. In this dystopian society, individuals rate each other through a social media app, affecting their social standing and opportunities in life. The episode underscores how AI-driven ratings and rankings can distort perception, leading people to prioritize superficiality and social conformity over authenticity and genuine human connections.
The Filter Bubble Effect and Echo Chambers

One of the significant concerns associated with AI algorithms is the filter bubble effect and the creation of echo chambers. AI-driven content curation leads to the formation of filter bubbles, where individuals are exposed only to information that aligns with their existing beliefs and preferences. Consequently, people are less likely to encounter diverse perspectives and alternative viewpoints, reinforcing their existing biases and limiting their understanding of complex issues.

In "Nosedive," the protagonist's obsession with maintaining a high social rating drives her to conform to societal norms and suppress her true self. Similarly, AI algorithms can inadvertently encourage individuals to conform to popular opinions and stifle dissenting voices, hindering the free flow of information. This narrowing of perspectives can lead to polarization and a fractured society, where individuals are isolated within their respective echo chambers, lacking exposure to diverse ideas and critical thinking.

Perpetuating cultural dominance and inequality

AI algorithms not only influence individuals' perception but also perpetuate cultural dominance and inequality in a globalized world. In the context of online content, the algorithms tend to favor popular and mainstream content, often originating from the dominant cultural and economic centers in the global north. This preference for established content creators and platforms reinforces their cultural dominance, marginalizing content from less privileged regions and cultures in the global south.
In "Nosedive," individuals' social ratings dictate their access to better opportunities, social privileges, and economic advantages. This mirrors real-world scenarios where AI algorithms, consciously or unconsciously, perpetuate social and economic inequalities. The global south, with limited access to technological resources and AI development, faces a disadvantage in shaping the digital narrative, further amplifying existing power imbalances.

AI algorithms have a profound influence on perception in a globalized world. The episode "Nosedive" from Black Mirror serves as a cautionary tale, warning us of the potential consequences of an AI-driven society where ratings and algorithms shape human interactions and self-worth. The filter bubble effect and echo chambers created by AI algorithms hinder the open exchange of ideas and contribute to societal polarization. Moreover, the perpetuation of cultural dominance and inequality raises concerns about the homogenization of online content and the marginalization of diverse voices. To address these challenges, it is essential to prioritize transparency and accountability in AI algorithms, promote media literacy, and foster a diverse and inclusive digital landscape that empowers users to critically engage with information and shape their own perceptions.

"Hated in the Nation" (C6 – S 3): Challenges: Addressing Bias, Privacy, and Access in AI Content Generation

"You know, I’m not even on there [social media]. Never saw the point of it, really. Seems like most of what goes on online is a bunch of people saying stuff they don't dare say in person. It’s a good way of spreading hatred." - Karin Parke (Black Mirror, Season 3, Episode 6 - "Hated in the Nation")

*Biases in AI Content Generation*
AI content generation is based on complex algorithms that learn from vast amounts of data. However, this data can contain inherent biases from various sources, including human prejudices and social inequalities. These biases are reflected in the generated content, which can perpetuate stereotypes, discrimination, and societal inequalities.

The "Hated in the Nation" episode of Black Mirror addresses this issue in a striking manner. In the episode, robotic bees equipped with AI are used to carry out deadly attacks targeted at specific individuals (an act already horrifying and highly condemnable). The original goal was to identify those widely hated on social media, however, in the height of algorithmic arbitrariness, the AI driving the bees was also influenced by society's biases. As a result, anyone could become a target of the attacks.

To address this challenge, it is crucial to implement AI development practices that are mindful of biases and promote diversity in training data. Transparency and continuous monitoring are also essential to detect and correct potential biases generated by AI.

Privacy and Access in AI Content Generation

The use of AI in content generation also raises concerns about user data privacy. AI algorithms collect and analyze vast amounts of personal information to customize content, raising ethical questions about privacy protection and informed consent.

In "Hated in the Nation," the attacks with robotic bees were based on data from social media and online comments, highlighting how lack of privacy can lead to serious consequences. Massive disclosure of
personal information can expose individuals to grave dangers and abuses of power.

To address this challenge, it is fundamental to establish robust regulations to protect user privacy and ensure data is used ethically and transparently. Additionally, it is important to consider how to guarantee equitable access to AI technology, especially in regions with resource limitations and digital divides.

**Conclusions**

The ubiquity of artificial intelligence (AI) in image production and consumption has sparked a revolution in various fields, from automated content creation to personalized visual experiences. However, this transformation is not without complex and challenging issues that span from local contexts to global perspectives. In this regard, analyzing how AI affects visual representation and personal memory emphasizes the need for a critical and mindful examination of its influence on our perception of the world.

The proliferation of artificial intelligence has resulted in an abundance of images and content, which can impact the authenticity and quality of what is produced and consumed. Additionally, AI-driven content personalization and filtering can give rise to filter bubbles and echo chambers, where individuals isolate themselves from diverse perspectives, leading to social polarization and cultural fragmentation.

The digital divide between the Global North and the Global South is accentuated by the uneven implementation of AI. While in the Global North, developed and technologically advanced nations have access to cutting-edge technology, in the Global South, developing nations face
challenges in accessing the same technology, solidifying a neocolonial dynamic of inequality and technological dependence.

AI algorithms, in shaping perception and content selection, can mirror and perpetuate cultural dominance and existing inequality, reinforcing the predominant perspective of the Global North while marginalizing the voices and viewpoints of the Global South. Additionally, AI content generation is susceptible to biases and prejudices inherent in historical data used for training.

The lack of transparency in AI content generation processes and the utilization of users’ personal data raise serious concerns about privacy and access to information. Data protection and appropriate regulation are crucial to prevent misuse and violations of privacy.

Collectively, these findings underscore the critical challenges we face in the era of artificial intelligence, where technological disparities and biased algorithmic influence can perpetuate socioeconomic and cultural inequality. To address these challenges, a multidisciplinary and collaborative approach is necessary, promoting transparency in AI processes, fostering equitable access to technology, and safeguarding users’ privacy and rights. Only through critical understanding and conscientious action can we fully harness the potential of AI.

References


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