
AI translation · View original & related papers at
chinaxiv.org/items/chinaxiv-202507.00233

AI-Powered Creative Communication Enhances Audience Attention and Empowers New Quality Productive Forces in Traditional Media: Post-print

Authors: Li Lijuan

Date: 2025-07-09T00:00:00+00:00

Abstract

[Purpose] This paper explores how AI creative communication enhances audience attention, addresses the issues of audience loss and declining influence in traditional media, empowers traditional media, and elevates new-quality productive forces in news communication. **[Method]** The analysis examines the application of AI large models in news communication practice, the characteristics and dual nature of AI creative communication, and elaborates on and draws upon terms and concepts from advertising marketing and economic management such as creative communication, attention resources, and consumer experience to reveal their mechanisms for attracting and maintaining audience attention. **[Results]** AI creative communication significantly enhances audience engagement and loyalty in traditional media, and promotes the diversified development of media content and forms. **[Conclusion]** AI is not only a key driving force for the transformation and upgrading of traditional media, but also an important key to unlocking new-quality productive forces, bringing unprecedented development opportunities and challenges to the media industry. Through the deep integration of AI technology and media practice, traditional media is expected to achieve efficient conversion of attention and deep excavation of value.

Full Text

AI-Powered Creative Communication Enhances Audience Attention and Empowers New-Quality Productivity in Traditional Media

(Kunming Chenggong District Converged Media Center, Kunming, Yunnan 650500)

Abstract

[Objective] This paper explores how AI-powered creative communication can enhance audience attention, address the challenges of audience attrition and declining influence in traditional media, and empower these institutions to elevate their new-quality productivity in news communication. **[Method]** The analysis examines the application of large AI models in news communication practice, the characteristics and dual nature of AI creative communication, and draws upon concepts from advertising, marketing, and economic management—such as creative communication, attention resources, and consumption experience—to illuminate mechanisms for attracting and sustaining audience attention. **[Results]** AI-powered creative communication significantly enhances audience engagement and loyalty in traditional media while promoting diversified development in both content and form. **[Conclusion]** AI represents not only a key driver for the transformation and upgrading of traditional media but also a crucial key to unlocking new-quality productivity, bringing unprecedented opportunities and challenges to the media industry. Through deep integration of AI technology with media practice, traditional media can achieve efficient conversion of attention and deep value extraction.

Keywords: AI large models; creative communication; attention resources; information consumption; new-quality productivity

The news communication industry faces numerous challenges, including information overload, fragmented audience attention, and the impact of new media. Deepening media convergence represents a long-term path to actively address these difficulties and adapt to transformation needs. With the emergence of large AI models entering various industries, media convergence must simultaneously embrace AI to meet challenges through transformation. Applying AI-powered creative communication in news communication practice can help traditional media capture attention resources and enhance audience attention, achieving a leap in news communication quality and efficiency. Traditional media must pursue innovation through change, commit to applying new technologies and new media, empower the development of new drivers, create new forms of cultural and technological media, and better leverage the guiding power and influence of news communication.

1. AI Large Models and Humanity

1.1 Large Models and Large Language Models

AI large models encompass two closely related yet distinct concepts: Large Models and Large Language Models (LLMs). Both represent new concepts in artificial intelligence, each playing an irreplaceable role in specific domains.

Large models are giant, complex algorithmic structures within the field of machine learning. Like massive ships navigating oceans of data, they can ingest and

digest vast amounts of information, extracting and parsing both subtle details in images and profound meanings in language within their complex architectures. This powerful data processing capability enables large models to demonstrate exceptional performance in numerous tasks such as image recognition and natural language processing.

Large language models, meanwhile, are the language specialists within the large model family. They focus on parsing and generating natural language, capable of producing fluent articles, accurate translations, or creative text generation through their deep linguistic foundation and learning capabilities. By extensively learning from massive text datasets, large language models gradually master the essence and patterns of language, becoming powerful assistants in human linguistic communication.

1.2 Characteristics of AI Large Models in Data Processing

AI large models exhibit characteristics of speed, efficiency, and diversity in data processing. They can autonomously perform machine learning, natural language processing, and big data analysis, with their core value lying in storing and analyzing massive datasets that typically measure in petabytes (1024 TB), exabytes (1024 PB), or even zettabytes (1024 EB).

First, AI large models process data with high speed, timeliness, and efficiency. The generation of big information data occurs extremely rapidly, with continuously improving information transmission and storage capabilities leading to exponential data growth. Various levels of news media produce vast amounts of information daily, while AI large models themselves generate substantial data every second. Compared to the human brain, AI large models can quickly and accurately analyze and process this data.

Second, they handle diverse data types and sources. Big data originates from widespread sources, including structured data (such as tables and fields in databases) and unstructured data (such as text, images, and videos on media platforms). This data can come from various channels like sensors, mobile devices, and the internet, exhibiting diversity and complexity. AI large models must also efficiently filter out useless information in big data, known as removing “noise.” To find and extract valuable information from big data, they must employ data mining and artificial intelligence technologies for processing and analysis.

Third, AI large models cannot independently identify data authenticity and validity. Big data contains significant uncertainties regarding quality, accuracy, and credibility. Due to data diversity and widespread sources, ensuring every data point is accurate and reliable is difficult. Therefore, when using big data for analysis and decision-making, AI large models cannot completely verify data authenticity and reliability.

1.3 Human-AI Large Model Interaction Modes

Human interaction with AI large models occurs in three primary modes. The first is the **embedding mode**, where large models are called upon at specific stages. Users communicate with AI through language, using prompts to set objectives, and AI assists in achieving these goals. In this mode, AI functions as a tool executing commands while humans serve as decision-makers and commanders. The embedding mode is common in generative AI applications, such as using AI to create novels, music, or 3D content.

The second is the **copilot mode**, where every stage can involve interaction with large models. In this collaborative mode, AI serves as an auxiliary tool working with humans to complete tasks. AI can understand human needs and objectives, generating appropriate outputs based on human input or providing evaluations based on human output to achieve effective human-machine collaboration.

The third is the **agent mode**, where large models autonomously plan, decompose, and execute tasks. AI Agent is an intelligent entity capable of perceiving environments, making decisions, and executing actions. Unlike traditional AI, AI Agents possess the ability to independently think and call tools to gradually accomplish given objectives.

1.4 What AI Changes and What It Does Not

In this era of rapid AI development, everyone has experienced tremendous changes in work methods while recognizing certain things AI cannot change. From automated efficiency improvements to AI-assisted decision-making, artificial intelligence seems to be reshaping all expectations for the future news industry.

AI primarily changes work efficiency through automation, making many tasks more efficient and freeing our time to focus on more creative endeavors. It also creates new positions that continuously emerge with AI technology development, such as news manuscript statistics and related news work ledger production in the news industry, opening new employment pathways for media organizations. Additionally, AI enables scientific decision-making by processing and analyzing large amounts of data to provide more scientific and reasonable decision-making support for news media and practitioners.

However, AI cannot change humanity's unique values and capabilities. The power of creativity and emotion remains something AI cannot replicate. In new work environments, these abilities become more precious and are key to maintaining our competitiveness in the AI era. While AI may be logically flawless, human ethical and moral judgment remains an important cornerstone for guiding AI development. Humanity's ability to face uncertainty and change is something AI cannot match. In the AI era, lifelong learning and adaptation become even more important. What remains eternal is our unique value and capabilities as human beings.

2. The Dialectical Application of AI Large Models

2.1 Application Scenarios of AI Large Models in News Communication

AI-powered creative communication can be simply defined as the combination of AI technology and creative elements to achieve innovation and upgrading in news communication. In news gathering and generation, this includes automated news writing, data journalism, and intelligent recommendation. AI's advantages in news distribution and dissemination include personalized push notifications, interactive experiences, and cross-platform integration. As generative AI technology continues to evolve, outstanding AI creators and model trainers among news practitioners can more efficiently complete personalized content creation for images, templates, and short videos, using creative tools for assisted creation according to market demands.

In product production, applying AI large models in H5 and video production involves clarifying themes, specific styles, and detailed descriptions of elements such as composition ratios, seasons and times, lighting and colors, through repeated attempts and modifications to ultimately produce satisfactory photographs, paintings, or creative short videos. This is AI associative generation. The performance of AI inspiration drawing functions continues to update and improve, requiring continuous attention to new features and exploration of new creative methods.

Media organizations can provide “one-stop” solutions centered on audience needs, leveraging high-quality content operation experience to continuously improve product service systems and enhance service capabilities and user experience. Addressing the entire process of news content production, management, and dissemination, they can provide customized services for different content types including professionally produced content and AI-generated content. “Visual+” value-added services offer audiences comprehensive “one-stop” solutions with efficient delivery, becoming valuable “efficiency tools” for audiences.

AI also helps media build brands and images. With the arrival of the AI intelligence era, actively embracing AI large models and giving full play to traditional media's core advantages—such as the journalist creation ecosystem, massive high-quality content data, and rich scenarios—establishes an “AI+Content+Scenario” development strategy. Oriented by audience needs and following network-related laws and regulations, this strategy injects new vitality into media brand building by deeply cultivating advantageous business scenarios.

Furthermore, AI provides intelligent services for audiences. By linking different application scenarios including search engines, intelligent creation, advertising and marketing, office documents, design tools, audio and video editing, and intelligent terminals, media can enhance the depth and breadth of high-quality content and intelligent services reaching massive audiences served by the plat-

form.

2.2 Addressing the Challenges and Problems of AI Large Models

AI large models can complete autonomous learning and exhibit significant dual characteristics. Their security issues cannot be solved through traditional security methods and should receive sufficient attention with efforts dedicated to resolution.

First, AI large models are prone to errors and generating false content. AI makes mistakes, fabricates information, and creates stories out of nothing. When asked a question, it may fabricate a small story based on past experience, containing numerous fabricated details that constitute serious problems upon careful reading. Currently, AI can also generate false video content. Using a photo found online and a person's voice from the internet, AI can quickly clone someone's appearance and voice within seconds to produce a deceptive video. If this technology imitates celebrities or influencers to spread false statements online, it could cause significant trouble.

Second, AI is susceptible to manipulation. Before AI large models, attacking a system required programming knowledge. Today, communicating with AI is simple—one can use any language including Chinese. AI large models at this stage resemble naive human children. Malicious actors can chat with AI, apply special combination training to persuade it to obey completely, potentially leaking confidential information. This professionally termed “injection attack” poses enormous challenges to AI large models in data security and privacy protection.

Third, the principle of AI for good. During training, AI large models face data contamination issues. As software-based digital systems with vulnerabilities that can be attacked, if the data used to train AI is contaminated, the AI may perform tasks incorrectly and produce outputs that do not meet human needs. How to align AI training with human ethics also represents a security challenge.

Like any emerging technology, AI has a dual nature—it can be a useful tool or a weapon. When applying AI large models, humans must strengthen technology research and development, improve laws and regulations, enhance data security awareness, and other security measures, using AI dialectically.

3. Overview of AI Creative Communication and Attention Resources

3.1 AI Creative Communication

3.1.1 Conceptual Analysis The concept of AI creative communication originates from advertising studies. In advertising and marketing, creative communication refers to the process of conveying information, establishing brand image, and driving sales to target audiences through creative and attractive methods. When applied to news, creative communication emphasizes using

unique, creative concepts, images, text, sound, and visual effects in communication practice to capture audience attention and evoke emotional resonance. The essence of creative communication is a form of influence that guides human behavior, transforming intangible concepts into tangible information products.

3.1.2 Main Characteristics Creative communication typically refers to effectively conveying information, ideas, or products to target audiences through innovative and unique methods. Its main characteristics include originality, interactivity, and innovation, emphasizing novelty and uniqueness of content. It attracts audience interest through interesting visual, auditory, or narrative elements to establish emotional connections, encourages audience participation and interaction, and improves information dissemination efficiency and audience engagement. Creative communication often pursues long-term effects rather than short-term sensationalism, with clear target audiences and communication objectives for the disseminated information or products. It packages information through storytelling to make it more vivid and understandable, and creative content is easily shareable, enabling rapid dissemination on social media platforms. The success of creative communication largely depends on whether it can arouse audience interest and convey messages in a compelling manner.

3.2 Attention Resources

3.2.1 Definition of Attention Resources Michael H. Goldhaber first proposed the concept of “attention economy” in his December 1997 article “The Attention Economy.” He argued that in the information society, information itself is not scarce; what is truly scarce is people’s attention. Goldhaber emphasized that the attention economy is the essence of the network economy, with attention becoming a key resource for wealth acquisition. However, excessive emphasis on attention may lead to drawbacks, such as media adopting vulgar content strategies to attract eyeballs while neglecting social responsibility and cultural taste. Therefore, scholars propose that media economy should shift from pure attention economy to influence economy—achieving deeper social and economic impact through effective communication. Goldhaber’s research expanded the vision of attention economy, proposing that attention can be transferred and exchanged, even predicting that “attention transactions” might become the focus of future economic systems. These views and predictions have been validated to some extent in today’s social development.

AI large models can analyze individuals’ work, study, life, and health data to form exclusive knowledge bases for each person. Combined with persona generation, they can deliver personalized content recommendations, effectively enhancing audience attention. Based on attention, news communication should also pursue influence—generating positive social impact through high-quality news content.

3.2.2 Attention Resources in News Communication Attention resources in news communication refer to maximizing the attraction of users' or audiences' attention by cultivating potential audience groups to obtain maximum reads and likes, thereby achieving better publicity, education effectiveness, and social benefits. Attention resources in news communication are extremely limited. When facing large amounts of news information, audiences selectively pay attention to certain news based on their interests, needs, and values, filtering out uninteresting information to concentrate on what they consider important. Therefore, news value becomes particularly crucial, with factors such as news attractiveness, timeliness, importance, proximity, and prominence influencing audience attention resource allocation. The higher the audience's participation in news, the more attention resources they invest. High-quality news content more easily attracts and maintains audience attention by providing in-depth analysis, unique insights, or rich information. Different communication channels—television, newspapers, internet, social media—have varying effects on acquiring audience attention resources.

3.3 News Information Consumption Experience

News information consumption experience refers to audiences' subjective feelings and psychological reactions during the process of receiving, processing, and evaluating news information. This experience involves not only the content itself but also information presentation methods, communication channels, and audiences' personal backgrounds and emotional reactions. News content quality, information presentation methods, cultural and regional relevance, and entertainment value directly affect audience experience. Presentation methods such as text, images, video, audio, or data visualization influence audience understanding and feelings. Audiences may prefer news content customized according to their interests and preferences, enhancing their information experience through interaction such as commenting, sharing, and participating in discussions.

The convenience of accessing news information, audience trust in news sources, the alignment of news with audiences' cultural backgrounds and values, whether content can evoke emotional resonance, and whether it can promote audience thinking all affect their acceptance and evaluation of information. Additionally, the stability, speed, and innovation of technology platforms also influence audience news consumption experience. News information consumption experience is multidimensional, and media must consider these factors when producing and disseminating news to provide high-quality content and positive user experiences.

4. Strategies for AI to Help Traditional Media Enhance Audience Attention

4.1 Precision Targeting to Improve News Communication Relevance and Effectiveness

AI enhances news communication relevance and effectiveness through data analysis for precision audience targeting. News information transforms virtual information into social and economic value, creating influence. In the era of media convergence, media operation strategies are transforming. AI-assisted creation not only improves content production efficiency and quality but also provides creators with new ideas and tools. During AI application, the structure and function of traditional media are also reshaped, with newspapers, radio stations, and television stations moving toward integration with the internet, continuously enhancing systematic synergy, reconstructing and forming a completely new “media” ecosystem. The entire business chain of “planning, gathering, editing, reviewing, distributing, evaluating, and feedback” in news communication practice is driven by technology at its core, aiming for high-quality development. In the process of new media technology transformation, innovating production tools promotes iterative optimization of media content production methods, communication means, and distribution channels, helping the media industry upgrade toward strategic emerging industries and future industries, and effectively driving the deep optimization of communication strategies for new mainstream media under deep mediatization.

4.2 Optimizing Communication Strategies to Achieve Personalized News Push

Based on big data analysis, AI helps traditional media optimize communication strategies to improve audience attention and news communication effectiveness. AI-assisted creation not only enhances content production efficiency and quality but also provides creators with new ideas and tools. In the process of applying AI, the structure and function of traditional media are also reshaped, including the integration of newspapers and radio stations with television stations and the internet, continuously enhancing systematic synergy, reconstructing and forming a completely new “media” ecosystem. The entire business chain of “planning, gathering, editing, reviewing, distributing, evaluating, and feedback” in news communication practice is driven by technology at its core, aiming for high-quality development. In the process of new media technology transformation, innovating production tools promotes iterative optimization of media content production methods, communication means, and distribution channels, helping the media industry upgrade toward strategic emerging industries and future industries, and effectively driving the deep optimization of communication strategies for new mainstream media under deep mediatization.

4.3 Leveraging AI Technology to Achieve Multi-Platform Linkage and Enhance Communication Efficiency

Currently, AI-powered intelligent search has been launched, supporting image and video search using “natural language.” AI image editing tools (model conversion, illustration conversion, image expansion, background removal, etc.) and AI inspiration drawing functions have been deployed, enabling news practitioners to conduct secondary creation online using these functions to achieve better user experiences and higher work efficiency.

AI helps traditional media innovate communication methods and improve information dissemination efficiency. Many AI large models integrate innovative technologies with social necessities, achieving large-scale applications in key areas such as news transcription, powerfully promoting the steady development of regional digital economy and AI industries. In AI key technologies for South and Southeast Asian languages, breakthrough progress has been made in Thai and multiple other languages across speech recognition, speech synthesis, image-text recognition, and text translation, with average indicators approaching 90% practical levels, helping the media industry expand its international communication scope.

4.4 Utilizing AI Technology to Mine News Value and Enhance Content Quality

AI plays a tremendous role in content creation, editing, and personalized recommendation, improving news content quality. Whether writing travel essays about flower viewing with a literary and free-spirited style, introducing the charm of cities and landscapes in multiple languages, or creating stories based on images, AI large models can flexibly respond to various requirements proposed by news practitioners with logical rigor.

Relying on big data, artificial intelligence, cloud computing, blockchain, and other technologies, integrating massive amounts of global high-quality images, videos, music, and other content, AI becomes an efficiency tool trusted by high-quality content providers and users. Relying on natural language search products and creative tools and inspiration drawing products based on generative AI technology continuously injects new vitality into high-quality content production.

4.5 Utilizing AI Technology to Enhance User Engagement and Audience Interaction

AI enhances audience interaction and improves audience participation and loyalty through data analysis. On one hand, AI large models can directly provide services for media work; on the other hand, they can provide AI technical support services for audiences as technology providers. By cultivating new media practitioners and exploring new creators, exploring AI associative creation news business models, and solidly promoting the implementation of the

“AI+Content+Scenario” strategy, media can convey China’s new media brand image and creative strength faster and better, telling China’s story effectively.

Traditional media should actively embrace AI and accelerate the formation of new-quality media productivity. Media should transform from merely providing content to providing intelligent services that include not only high-quality content but also data and technology, gradually transitioning from cultural media to a cultural and technological media industry that emphasizes both content and technology.

5. Future Outlook

The most important task for journalists in the AI era is to enhance professional skills to better instruct AI, allowing AI to improve the quality and efficiency of news communication practice. Continuous learning and self-improvement are essential. The AI era requires constantly learning new skills, particularly those difficult for AI to replace, such as innovative thinking, interpersonal communication, and leadership.

We should view AI as a tool to improve work efficiency and quality of life, exploring new models of AI-human collaboration to co-create value rather than treating AI as a competitor. Maintaining an optimistic mindset about the future is crucial—believing that human creativity and adaptability can help us find new growth opportunities in the AI era.

The arrival of the AI era presents both challenges and opportunities. By understanding the changes AI brings, actively adapting, and leveraging our unique values, we can better prepare ourselves for the future. Let us embrace change, seek eternal values, and jointly create a better future.

AI-powered creative communication holds broad future development trends and application prospects in the field of news communication. This research originates from news communication practice and has certain limitations in exploring AI application in the news industry. Regardless, the future has arrived, and traditional media and journalists should actively embrace AI technology, continuously improve their professional capabilities and standards, and achieve transformation and upgrading.

References

- [1] Wang Sanshou. *Big Data Business Application Scenarios* [M]. Beijing: Mechanical Industry Press, 2016.
- [2] Yang Weitao. Analysis of Precision Employment Guidance in Higher Vocational Colleges Based on Big Data Concepts [J]. *Fujian Education Research*, 2018(1): 2.
- [3] Kunlun Wanwei AI Agents Development Platform “Tiangong SkyAgents” Beta Version Full Network Test [EB/OL]. (2024-05-29) [2024-12-21].

<https://www.aigc.cn/67354.html>.

[4] Yan Tongbao. Research on Security of Reputation Systems in Wireless Sensor Networks [D]. Harbin: Harbin Engineering University, 2012.

[5] Tan Tian. *Integration and Transformation: Reconstructing Chinese Television* [M]. Beijing: China Radio and Television Press, 2017.

[6] Zhang Xin. Analysis of University Library Reading Therapy Services Integrated into Social Psychological Service System Construction [J]. *Library Research and Work*, 2020(7): 32-35.

[7] Zhang Daping, Yin Renkun, Chen Chao. *Software Project Management and Quality Development* [M]. Beijing: Tsinghua University Press, 2015.

[8] Wei Xue. Innovation and Challenges in Content Production Under Media Convergence [J]. *China Media Technology*, 2024(12): 94-97.

[9] Tang Jun. Media Convergence and Reshaping from the Perspective of Scope Economy [J]. *Media*, 2020(11): 68-71.

[10] Dai Yuchu, Liu Yichuan. Analysis of the Value Logic of New Mainstream Media Influence Forging—The Value Logic of CCTV' s Series of Deep Embedded Communication Actions [J]. *TV Research*, 2022(12): 92-95.

[11] Liu Wenbo. Simultaneous Translation of 4 Minor Languages! New Breakthrough in R&D by Yunnan Institution [EB/OL]. (2022-08-12) [2024-12-21]. <https://www.toutiao.com/article/7130950237203464711/?wid=173>.

[12] Meng Xiaoming. Enhancing the Real Capabilities of Editorial Teams in “Four Strengths” Education [J]. *China Prefecture City Journalists*, 2020(7): 3.

Author Profile: Li Lijuan (1973–), female, from Chenggong, Yunnan, bachelor' s degree, senior journalist, research direction: news communication.

(Responsible Editor: Li Yansong)

Note: Figure translations are in progress. See original paper for figures.

Source: ChinaXiv –Machine translation. Verify with original.