

A Study on the Representation of “Truth, Goodness and Beauty” of AI Virtual Anchors from the Perspective of Intelligent Communication

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How to cite this paper: Zhang, Y. and Tong, H.J. (2026) A Study on the Representation of “Truth, Goodness and Beauty” of AI Virtual Anchors from the Perspective of Intelligent Communication. *Journal of Computer and Communications*, 14, 49-68. <https://doi.org/10.4236/jcc.2026.148003>

Received: July 14, 2026

Accepted: August 17, 2026

Published: August 20, 2026

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Abstract

AIGC technology continues to reshape the media industry ecosystem, and AI virtual anchors are now widely applied in news production and international communication. Current related research mostly focuses on technical aspects such as algorithm optimization, practical applications, and ethical risks, with less analysis from the perspective of value core. This paper uses a three-dimensional analytical framework of “truth, goodness, and beauty” to sort out its practical paths in fact construction, social consensus building, and audio-visual aesthetic expression. The study finds that relying on human-machine collaborative production and algorithmic process tracing can safeguard the bottom line of news authenticity. Anthropomorphic virtual images and immersive interactive scenarios can also enhance communication aesthetic effects. However, AI virtual anchors currently exist issues such as rigid emotional expression, homogeneous visual images, and insufficient empathy. During the intelligent media transformation, how the industry can balance technological instrumental rationality with humanistic values, form a stable human-machine collaborative broadcasting model, and provide reference ideas for the healthy development of intelligent news.

Keywords

AI Virtual Anchor, Phoxinus Phoxinus Subsp, Phoxinus Shanmei, Intelligent Communication, Audiovisual Communication

1. Introduction

With the large-scale implementation of generative AI technology, the global me-

dia integration process has entered a deep transformation period. Intelligent virtual anchors are gradually moving beyond their role as mere technical tools and becoming independent participants in the news storytelling process. While industry applications are rapidly expanding, the user experience shortcomings of virtual AI anchors are becoming more obvious: rigid speech templates, similar emotional tones, and weak interpersonal empathy are common issues reported by audiences. These perception gaps reflect the inherent tension in intelligent news communication: as human anchors are increasingly being replaced by digital virtual ones, how to adapt and innovate the long-standing public communication values of news is now a key frontier topic in the field of intelligent communication. Current academic and industry research mainly focuses on algorithm optimization, communication efficiency, and data security ethics of virtual anchoring products, often taking a technical-centric perspective and rarely analyzing the core communication values systematically. Based on this, this paper uses a three-dimensional framework of “truth, goodness, and beauty” to explore the intrinsic communication patterns and practical characteristics of AI virtual anchors in news fact-checking, public consensus-building on social issues, and aesthetic expression through audiovisual symbols. Adopting the case study approach, this paper selects research cases based on open materials from Xinhua News Agency, existing literature and public data released on social media platforms.

2. The Technological Evolution and Industry Iteration of AI Anchors

2.1. Production Logic Iteration: From Automated Content Creation to Virtualized Subject Communication

With the deep iteration of information and communication technology and artificial intelligence, the digital transformation of the media industry continues to advance, and the implementation of AIGC technology further promotes a comprehensive revolution in the news production paradigm. The development of AI virtual anchors reflects the path of media intelligence, showing an evolution from backend automation of content production to the virtualization of the front-end broadcasting persona. The evolution of media intelligence can be divided into two stages: the first stage is backend content automation, focusing on reducing costs and improving efficiency in text production. Tencent Finance’s writing robot Dream Writer was the first to automatically generate financial news, and later various AI writing tools became widespread, replacing human labor in news editing and reporting. The second stage is front-end broadcasting virtualization, where the focus shifts from backend text generation to on-screen news presentation. Globally, the technology for virtual anchors started earlier: in 2001, UK television launched the virtual host Ananova, but at that time, the technology could only generate a static virtual persona for reporting. In 2019, the BBC upgraded its intelligent broadcasting system Beeb, adding personalized content distribution and real-time audience interaction features, marking a shift in industry focus from

simply replicating virtual images to interactive human-AI intelligence [1]. Against the backdrop of global virtual anchor technology adoption, domestic media organizations have gradually expanded AI from backend editorial assistance to front-end news broadcasting, accumulating technical experience for the practical application of AI virtual anchors in China.

2.2. Business Model Iteration: Intelligent Upgrades in Leading Media Organizations

Amid the wave of AI, leading media organizations in China are pushing forward digital transformation, using big data and multimodal AI technology to restructure the news production process, and driving media integration from simply combining content channels to intelligent collaboration across the entire workflow. Top domestic news platforms have developed their own “Media Brain” system, which applies a range of new technologies like “AI anchors”, “live cloud”, and “media creative factory” to transform every step of news production, promoting deeper media integration [2]. By leveraging big data and multimodal AI technology to restructure news production, they push media integration from content channel consolidation to full-process intelligent collaboration. The self-developed “Media Brain” system integrates AI with big data computing power to digitally reconstruct the entire chain of news—clue discovery, content gathering and editing, content review, and distribution to end users—enabling automated circulation of non-deep news content, representing an advanced exploration of machine-driven news production. In terms of media transformation, Media Brain serves as backend foundational computing infrastructure, mainly improving internal production efficiency; while AI anchors are frontend visual applications for the public, concretely showing how the platform’s intelligence strategy is implemented externally, rather than just being a simple tech showcase. Looking at product development chronology, in 2018 the world’s first standing real-time AI news anchor, Xin Xiaohao, was launched, and in 2019 an updated product, Xin Xiaomeng, achieved standing reporting and regular use in large feature reports. The continuous optimization of these two products reflects a practical path for domestic news platforms to deeply integrate AI technology with professional news broadcasting.

2.3. Interaction Form Iteration: From Lifelike Appearance to Emotional Empathy Expression

The evolution of domestic AI news anchors clearly shows how multimodal simulation technology has been applied and refined in news broadcasting. Their appearance, expressions, and interaction skills are gradually getting closer to those of real human anchors. The first generation of 2D AI anchors introduced in 2018 could only sync sound with virtual visuals to achieve basic audiovisual realism, and were limited to static on-camera speech. The 2019 version added hand and head movements, breaking the flat visual limitation, adding body language, and improving visual realism. By 2020, 3D AI anchors appeared in current affairs re-

porting, representing a leap in simulation technology. These could adapt to various makeup and hairstyles, with details like hair and facial textures closely matching human features, and even included micro-expression algorithms to match expressions with the news context. This iteration shifted the tech goal from simply replicating voice and visuals to expressing emotions contextually, reducing the mechanical feel and enhancing the audience's immersive experience. Overall, domestic AI anchors have progressed along the path of realistic appearance, gestures, and emotions, evolving from cold technical simulations to communicators with basic emotional empathy, effectively shortening the perceived gap between humans and machines.

3. The Dimension of Truth-Seeking: The Dual Representation and Inner Paradox of AI News Anchors

Rooted in the fundamental norm of journalistic communication—objectivity and authenticity, the dimension of truth encompasses two progressive layers. The first refers to the ontological truth of facts, which requires traceable news sources and non-fictional narrative information, so as to avoid factual distortions such as AI hallucinations and corpus biases generated by large language models. The second denotes the perceptual truth of audiences. Relying on multimodal simulation technologies, it eliminates sensory separation in human-machine communication, builds a stable, neutral and unbiased broadcasting perception, and dialectically unifies news timeliness and content rigor.

Stratified Evaluation Criteria

- 1) Criterion of algorithm and source standardization: Whether a cross-verification mechanism for multi-source information is established, whether the algorithmic production chain is traceable, and whether the occurrence frequency of distortions including AI hallucinations, fabricated data and logical fallacies is controllable.
- 2) Criterion of timeliness and manual safeguards: Whether the broadcasting of breaking events tends to compress manual review procedures, and whether multi-layer manual verification mechanisms are deployed to offset native algorithmic defects and strike a balance between instant distribution and factual accuracy.
- 3) Criterion of audience perceptual objectivity: Whether broadcasting texts and vocal tones are stripped of subjective emotions and positional biases, and whether formulaic broadcasting triggers audiences' alienated cognition of journalistic authenticity.

3.1. The Truth of Objective Facts: Ensuring Accuracy through Source Verification and Algorithm Transparency

Generative AI is reshaping the entire news production process, deeply empowering stages like clue collection, script writing, voice broadcasting, and content review. However, "media technology is both a medicine and a poison". If used improperly, it can result in phenomena like "AI hallucinations". So-called "AI hallu-

cinations” occur when generative AI based on large models produces content that looks logical, fluent, and even seemingly reliable, but is actually wrong, fabricated, or misleading—in simple terms, it’s “AI talking nonsense seriously”. Compared to human reporting, AI leverages big data and cross-platform retrieval capabilities to quickly cross-check multiple information sources, reducing factual bias caused by subjective human oversight. But large models have inherent technical flaws, and AI hallucinations can lead to distorted facts: the models autonomously generate coherent, fluent text based on massive heterogeneous corpora but often produce hidden inaccuracies like made-up data, misplaced causality, or fictitious details. These errors are highly concealed and easily mislead audiences, and over time, they can erode public trust in media information and disrupt the order of public information dissemination.

Moreover, as algorithms continue to advance, issues like “information cocoons” and “algorithmic black boxes” make people question AI and algorithm applications. Transparency, seen as an extension of objectivity in the age of intelligent media, has already become a basic principle in today’s news reporting. As scholar Nicholas Diakopoulos notes in his groundbreaking book *Automating News*, holding algorithms “accountable” is necessary because the “facts” shown by AI aren’t genuinely objective reproductions—they are determined by the data selected, the trained models, and the final results behind them [3]. This shows that the truth reflected by AI combines certain technical rationality with inherent algorithmic bias, posing a structural challenge to traditional news objectivity.

3.2. The Truth in Audience Perception: The Emotional Quest for Truth Paradox Triggered by Technological Hyper-Objectivity

Besides obvious factual distortions, AI virtual anchors also face a subtle truth-seeking contradiction at the perceptual level, essentially a hyper-real perception paradox created by technical simulation. The way audiences perceive authenticity in AI virtual anchors relies on a full-dimensional human-like replication of visuals, voice, and body movements, gradually pushing audience perception from appearance-based “look real” to psychologically convincing “feels real”. Early 2D virtual anchors replicated real human facial contours to achieve external likeness, while later 3D virtual anchors refined micro-details like hair strands, pores, and micro-expressions, expanding dynamic interactions like walking, gestures, and outfit changes. Product iterations have always focused on recreating a real-life human state. This hyper-realistic technology effectively enhances the audience’s social presence—the sense of being in the room with a real person while watching the broadcast. Some 3D virtual anchors are modeled after real frontline professionals, capturing facial expressions and tones very closely, further blurring the boundary between human and machine viewing and strengthening interactive perception in news dissemination. Algorithmic control gives AI virtual anchors a unique advantage in perceptual truth-seeking, but also intensifies the paradox of hyper-real perception. Unlike human anchors who experience emotional fluctua-

tions and fatigue, AI virtual anchors can maintain consistent tone, expression, and speech patterns over the long term, allowing continuous 24/7 multi-platform news distribution and perfect alignment with the immediacy demands of smart media. During sudden public events, virtual anchors can bypass the safety risks of on-site reporting and quickly deliver emergency broadcasts, giving them a natural timeliness advantage. From a semiotic perspective, the uniform, structured, and error-free broadcasting style of AI virtual anchors is an idealized communication symbol, artificially polished. Baudrillard's hyperreality theory explains this phenomenon: when media simulation surpasses sensory thresholds, artificially constructed likeness symbols detach from real-world prototypes and replace objective reality as the audience's perceived reality. Audiences spontaneously transfer their emotional identification from real human anchors to the virtual replicas; this emotional projection doesn't come from the virtual entity itself, but from the symbolic illusion created by technical simulation, forming a hidden alienation of authenticity at the perceptual level.

3.3. Instant and Accurate Reporting, Sticking to News Timeliness and the Bottom Line of Facts

Timeliness is an extension of news authenticity and an essential practical point in the pursuit of truth. This is also the core truth-seeking advantage that sets AI virtual anchors apart from human broadcasters. Due to physiological limits, commuting, emotional adjustments, and other objective constraints, human anchors cannot be on duty around the clock. During sudden public events, there are often delays caused by content review, personnel deployment, and getting on-site shots. AI anchors, however, rely on cloud computing power and pre-set broadcast templates, offering high stability: they aren't affected by fatigue or mood swings and can operate 24/7 across multiple platforms, delivering news instantly. In emergencies like earthquakes or public sentiment incidents, AI can broadcast quickly using verified standardized scripts without anyone needing to be on-site, avoiding frontline occupational risks and filling gaps in news timeliness.

The language strategy of AI virtual anchors mainly removes human emotional fluctuations and personal bias, creating a highly rational and accurate 'super-objective' style to enhance the truthfulness of their reporting. Trained on massive corpora, AI virtual anchors follow computer instructions strictly. As long as the commands are correct, they rarely misread or skip content, especially numbers or lesser-known technical terms, which significantly improves news accuracy. As shown in **Figure 1**, when an AI anchor reports financial news like "Ningbo: The maximum housing provident fund loan for families with two or three children is raised to 800,000 yuan per household", it accurately states amounts and interest rates, making the news a highly reliable "quasi-database" source. Its meticulous language also technically reinforces the traditional journalistic principle of "objectivity", achieving a kind of "super-objectivity" that nearly sidesteps human subjectivity.

Compared with the subtle emotional color human anchors bring through personal interpretation, AI virtual anchors maintain a consistently formulaic, neutral tone, which can enhance news credibility and authority. This sends a message to viewers: the content I deliver is “pure fact” with no emotional tint, representing a technical peak of journalism’s advocated “objectivity”, though it’s worth noting this highly standardized style can lack human empathy. But prioritizing speed can also risk truthfulness. Under extreme fast-reporting demands, AI systems may compress manual double-check processes, relying solely on algorithms to identify sources and generate content. Coupled with AI hallucinations and corpus biases, this can lead to a “report first, correct later” scenario. Solely chasing speed creates an inherent tension between immediacy and factual accuracy, which means AI live reporting must be paired with multiple layers of human review to safeguard factual integrity and balance both the timeliness and objectivity of news.



Source:

https://www.bilibili.com/video/BV1aitjehE1t/?vd_source=570ad00f65c951745494d9bd496f29a9

Figure 1. Xinhua AI anchor Xin Xiaohao reporting financial news.

4. The Dimension of Goodness: Building Value Consensus and Representing Public Opinion

Oriented toward the rationality of media public value, the dimension of goodness centers on reconciling diverse social perceptions, consolidating consensus on public values and facilitating equal cross-cultural dialogue via AI virtual anchors to ease polarized online public opinions. Meanwhile, human-machine collaborative ethical governance demarcates the boundary of rights and responsibilities for technological communication, averting algorithmic biases and homogenized value expression, so that technology can serve public interests.

Stratified Evaluation Criteria

1) Criterion of public opinion reconciliation efficiency: Whether narratives on controversial social issues avoid binary opposition and emotional rhetoric, whether viewpoints of multiple stakeholders are presented in a balanced manner to mitigate consensus division caused by group polarization.

2) Criterion of flexible value transmission: Whether narrative discourse abandons dogmatic one-way indoctrination, whether anthropomorphic audio-visual symbols reduce audiences' psychological resistance, and whether mainstream public values together with the appeals of vulnerable groups are conveyed comprehensively and evenly.

3) Criterion of human-machine co-governance ethics: Whether institutional norms are formulated to restrict risks such as algorithmic black boxes and privacy leakage, whether a human-led and machine-assisted collaborative mechanism is constructed to compensate for AI's deficiencies in empathy and in-depth interpretation, and whether cross-lingual communication avoids implicit cultural stereotypes and Western discourse biases.

4.1. Gently Framing Topics to Balance the Public Opinion Environment

The dimension of doing good points to the public value rationality of news communication. At its core, it's about how media uses storytelling to harmonize diverse social ideas and build consensus on public values. Unlike real-life anchors, who bring their personal expressions into reporting, AI virtual anchors rely on a standardized corpus and uniform narrative patterns, giving them a unique edge in explaining public issues, facilitating cross-cultural dialogue, and managing risky public opinion. At the same time, they face inherent drawbacks like homogenized values and a lack of empathetic expression, creating a dialectical tension in tech-for-good applications.

Online public opinion is fragmented and emotionally charged, making it easy for individuals to fall into echo chambers and polarized thinking, with extreme expressions continuously tearing apart public consensus. AI virtual anchors, trained on massive, compliant news data, come equipped with a unified standard for public discourse. When reporting on socially and politically sensitive topics, they can proactively avoid emotional rhetoric and binary narratives. Unlike human anchors, who may show bias based on personal views or network influence, AI broadcasts strictly adhere to public communication norms, downplay conflict-laden statements, and focus on presenting multiple objective perspectives, helping audiences move beyond polarized, black-and-white thinking. For example, when covering contentious topics like the cost of living or public infrastructure, a virtual anchor doesn't amplify individual frustrations. Instead, it integrates official data, public concerns, and academic analysis, delivering a neutral, calm explanation that eases online tensions and maintains healthy public discourse. However, this approach has limitations: standardized scripts can reduce space for critical discussion, and overemphasis on balanced wording may dilute the voices of marginalized groups, leading to homogenized value expression.

4.2. Flexible Narrative Expression, Bringing the Audience Psychologically Closer

“Artificial intelligence is not about making machines like humans, nor about mak-

ing humans like machines; it's about better leveraging human abilities to solve the problems people face." The media industry must follow the principle of being guided by direction and rooted in content. While using technology, it should not blindly chase it at the expense of its purpose. Therefore, in news work, ethical values need to be embedded so that technology aligns with relevant regulations and expected goals throughout the process. How to integrate the basic principles of news production and dissemination in its use, bridging the gap between humanistic spirit and technical rationality, is something every media outlet needs to consider [4].

Traditional public information dissemination often uses an instructive or preachy tone, which can easily trigger audience resistance. AI virtual anchors, relying on a humanized audiovisual form, achieve a softer way of conveying values, shifting from one-way information injection to two-way value dialogue. On one hand, the virtual persona's friendliness can be flexibly adjusted to match the topic: for heart-warming livelihood issues, it uses a gentle tone and relaxed expressions; for public emergency issues, it uses a steady tone, breaking the traditional distance of serious reporting. On the other hand, with multi-modal storytelling technology, AI virtual anchors can deliver dynamic text, images, and data charts synchronously, turning abstract public values into concrete, easy-to-understand content, lowering the audience's comprehension barrier.

From a communication psychology perspective, virtual entities without independent subjective consciousness are less likely than human professionals to be tagged with a particular stance by the audience, resulting in lower resistance and higher acceptance of their value output. For professional news organizations, AI anchors are not just smart tech products but also new audiovisual symbols for explaining public values. Their core is benevolent, integrating social consensus and universal public values into content narrative, voice, and visual packaging throughout the chain, achieving light, routine, and flexible dissemination of public values.

Specifically, virtual anchors follow a three-path approach for flexible communication: selecting topics related to public interest, reconstructing the rhetoric of professional, complex texts, and adjusting broadcast tone to suit the context, ultimately guiding the audience to rationally understand public issues and form healthy public perceptions. As shown in **Figure 2**, in "New Xiaomeng at the Two Sessions", "New Xiaomeng" delivered reports with a gentle and friendly tone, making what would be boring political news lively and interesting, while also adding Chinese subtitles to convey information visually and audibly, helping viewers better understand the content and gain a deeper understanding of the Two Sessions [5]. This kind of communication model breaks out of the traditional grand, one-way narrative framework for public issues, replacing explicit persuasion with implicit empathy, softening the preachy feel of public information, and allowing public values to subtly and effectively permeate, significantly improving audience acceptance of public topics.



Source:

<https://tv.sohu.com/v/dXMvMTc1ODY3NTg1LzEyMjk4OTI3NS5zaHRtbA==.html>

Figure 2. Xin Xiaomeng, Xinhua's AI virtual anchor, covers the Two Sessions.

4.3. Human-AI Ethical Co-Governance, Defining the Boundaries of Responsibility and Rights for Spreading Goodness

Language barriers and aesthetic stereotypes are natural obstacles in international communication. With the multimodal speech recognition model SenseVoice, AI virtual anchors can achieve real-time translation and broadcasting in nearly 50 languages, making them suitable for international summits, trade fairs, and other large-scale foreign reporting. At the same time, the virtual avatars are aesthetically flexible and can adjust their appearance according to overseas audiences' preferences. Compared to human anchors, they are less sensitive to national biases and can use neutral media symbols to reduce cross-cultural misunderstandings. However, cross-language algorithms themselves have governance vulnerabilities: current training datasets have too high a proportion of foreign-language resources, and the algorithmic black box can unconsciously amplify Western discourse bias. This also requires human oversight, with multicultural professionals jointly reviewing content to avoid hidden cultural biases and maintain a baseline of equitable cross-cultural dialogue.

With the iterative advancement of generative models like ChatGPT and DeepSeek, AI virtual anchors are gradually moving beyond being mere tools. They now feature more human-like appearances, better context understanding, and dynamic interaction abilities, transforming into non-human actors in Bruno Latour's actor-network theory, forming diverse networks for news communication along with media professionals, platforms, and audiences. In large public live events like international sports competitions and nationwide political reporting, "AI anchors" are already being used regularly as "actors" in reporting, and they've matured enough to make a significant impact on the news industry [6]. However, technology is a double-edged sword, and the humanization of AI anchors also raises concerns about various ethical dilemmas they might bring [7].

The anthropomorphization of technology inevitably comes with expanding ethical risks. The widespread personalization of AI virtual anchors brings multiple moral dilemmas, becoming an invisible barrier that hinders technology from being used for good. In response to these ethical deviations, the industry has developed a dual-layer governance approach of “system regulation and human-machine collaboration”. To address issues like algorithmic black boxes, privacy leaks, and authenticity crises, the Chinese government has implemented a series of regulations to limit the use of AI anchors in live news broadcasting, covering areas like modeling, rendering, content review, and live interaction [8]. These regulations prevent inappropriate behavior and set minimum standards. On the internal media governance level, leading news organizations generally adopt a human-centered human-machine collaborative governance model, which is not just a simple division of labor but builds a “human-led, machine-assisted” ethical defense line. In standardized news reporting, AI is used for efficiently integrating materials, data reporting, and multilingual distribution, leveraging technical rationality. In in-depth commentary, emotional empathy, and controversial topic analysis, human professionals intervene to conduct value assessments, express emotions, and add the human touch, forming a “human-centered, machine-assisted” moral safeguard. For initial news broadcasts, AI anchors use their intelligent, efficient, and data-driven capabilities to produce news from an objective standpoint, and media professionals carefully review the entire production process before delivering the content to the audience. For segments that require further investigation and interviews, human anchors think through and accurately interpret the information, adding emotional elements, resulting in news that provides valuable facts, emotional warmth, human concern, and strong appeal for viewers [9]. This targeted approach to solving specific issues ensures that news technology exists for a “good” purpose, rather than deciding or twisting what “good” is.

5. The Aesthetics of Elegance: Three Layers of Visual and Auditory Appreciation—Appearance, Tone, and Interaction

Based on media audio-visual symbolic aesthetics, the dimension of beauty forms a three-tier aesthetic system from surface to depth: the superficial layer covers the visual aesthetics of virtual images; the middle layer consists of vocal aesthetics of spoken language; the in-depth layer refers to immersive interactive experience empowered by VR/AR/MR technologies. Media aesthetics fundamentally serves news content communication rather than mere technological spectacle, balancing visual diversity and humanistic emotional temperature.

Stratified Evaluation Criteria

1) Criterion of visual image aesthetics: Whether virtual modeling suffers from template homogenization, whether image design adapts to diverse communication scenarios and localized audience aesthetics, and whether the uncanny valley

effect is induced to reduce audience acceptance.

2) Criterion of vocal aesthetic expression: Whether speech synthesis delivers natural speech flow and hierarchical emotional tones, whether mechanical reading stiffness is eliminated, and whether secondary emotional creation of spoken language can be realized.

3) Criterion of immersive interactive aesthetics: Whether multimodal technologies construct panoramic news presence scenes to break screen barriers and enhance audiences' social presence, and whether a balance is maintained between technological simulation effects and the humanistic value of personalized host communication.

5.1. The Aesthetic Appeal of Virtual Simulation Character Design

The beauty of appearance is the most direct surface-level aesthetic expression of AI virtual anchors. Relying on 3D reconstruction, high-precision texture rendering, and facial parameter modeling technologies, AI virtual anchors have upgraded from flat, symbolic representations to realistic, human-like aesthetics. The design of an AI virtual anchor's appearance isn't just about being pretty; it's a carefully considered system of symbols meant to convey certain cultural meanings and identity recognition through visuals. According to Saussure's semiotic theory, a sign is made up of two parts: the signifier and the signified. In other words, the signifier of an AI virtual anchor is how it looks, while the signified is its content—its authority, friendliness, and innovativeness. The appearance of an AI anchor can be fine-tuned through algorithmic parameters to avoid camera distortion or facial flaws, achieving standardized visual aesthetics.

From the perspective of media aesthetic symbols, a depersonalized, standardized appearance fits the aesthetic requirements of public news dissemination. A real anchor's personalized looks can trigger audience biases and debates over appearances, whereas the balanced and soft neutral appearance of AI anchors can weaken these aesthetic prejudices, redirecting attention to the news content itself, making aesthetics serve the delivery of content. But realistic surface appearances also bring the problem of aesthetic homogenization: most virtual anchors today rely on the same basic facial parameter libraries, and the mainstream virtual anchors tend to have similar facial features, generally following a single "soft and gentle" aesthetic template, lacking differentiated and diverse aesthetic expression. Over time, this can cause visual fatigue in the audience and reduce the recognizability of the media figure. Although AI anchors look realistic, people can still immediately tell the difference from real anchors, which creates a feeling of discomfort, potentially triggering the "uncanny valley" effect and making the public less willing to accept these AI anchors, reducing their influence [10]. As shown **Figure 3**, Lingyu, the AI sign language anchor of China Central Television (CCTV), interpreted more than 2000 sign language gestures during the Winter Olympics, serving over 2 million people and achieving full coverage of all gold medal events [11]. Many netizens said its accuracy was much improved compared to previous

AI sign language anchors, but it still lacked some genuine emotion compared to real anchors, appearing stiff and unnatural. As Michael Young mentioned in his research on AI image aesthetics, AI-created works often lie between “beauty” and “gimmick”, generating a bizarre sense of unfamiliarity that can bring a surreal pleasure or extreme unease and doubt [12]. Therefore, the beauty of an AI virtual anchor’s appearance is a result of constant tension and compromise between technological controllability, symbolic demands, and this complex sense of aesthetics.



Source: <https://news.sina.cn/2022-02-25/detail-imcwiwss2894835.d.html>.

Figure 3. CCTV AI Sign Language Anchor “Lingyu”.

5.2. The Aesthetic Expression of Communication in the Fusion of Intelligent Audio-Visual Modalities

From a language perspective, AI virtual anchors’ pursuit of “beauty” shows up as a kind of “biomimetic” coordination. Speech synthesis technology can control speed, tone, and pause rhythm, mimicking the feeling and formal style of human broadcasting, adjusting to the emotional tone required for different news topics. Content on politics and livelihood can have differentiated broadcasting rhythms. This technology helps AI virtual anchors achieve optimal speed, tone, and pauses with the goal of simulating the feeling and formality of a human anchor to match the emotions needed for various news reporting scenarios. This is really a pursuit of rationality—for example, political news and social or cultural news have very different rhythms and tones.

Even though AI virtual anchors imitate human voice and intonation very realistically, it’s still just a cold, technical voice. When reading aloud, its handling of connected speech, pauses, and flow can feel off, often just stringing syllables together mechanically, lacking the natural feel of human speech. This is because AI virtual anchors aim for “truthfulness” rather than “emotion”. To make information as accurate, reliable, and neutral as possible, they have to remove naturally occurring, emotionally colored “noise” in human language, like personalized linking or retroflex sounds. This, to some extent, reduces the artistry of the speech,

making it a “soulless” assembly-line product—a product of “cultural industry”, turning it into a homogenized “virtual symbol”, which leads to the AI anchor “not speaking like a person” [13].

Compared to AI anchors, human broadcasters can add vocal expression to written text while reporting news, which is a kind of “audibilization” of the humanistic spirit, going beyond written language to fully express meaning. Regarding the expression of vocal language, Zhong Ziyuan in “The Cultural Value of Vocal Language Communication in China in the Era of Integrated Media” points out that vocal language communication broadly refers to any audibly-perceivable form of communication, distinct from text, gestures, or symbols. It can transform written works into forms infused with personal understanding and emotion. This “secondary creation” allows listeners to feel and resonate emotionally, fully showcasing the charm of the work. From this perspective, vocal expression is a gap that AI anchors, because of technical limitations, find hard to cross. Therefore, the “unnatural” rhythm of AI virtual anchors is a price they have to pay under current technology to achieve “super-objective” reporting.

5.3. The Beauty of Experience in Creating Immersive Interactive Scenes

In the era of smart media, the use of AI virtual anchors doesn’t exist in isolation. They need to work with technologies like VR, AR, and MR to create immersive, panoramic news scenes [14]. AI anchors can enter 3D virtual spaces built with smart technologies, making news more coordinated and enhancing the interactive experience for viewers. AI virtual anchors’ pursuit of “beauty” means using VR/AR/MR to give people a sense of being there, stimulating multiple senses and breaking the barrier of the screen so viewers feel truly present, which in turn strengthens the appeal and persuasiveness of the news.

For example, in large public reporting scenarios, high-tech tools like 5G transmission, VR/MR, and 3D LED screen stitching can be used to “clone” the same environment [15]. AI virtual anchors can “shake hands across space” with interviewees and guests, creating a “hyper-real” news scene that blends the real and virtual worlds. This kind of immersive news setup offers readers a better experience, helping them understand news content more intuitively and making it easier for media to influence their values.

6. The Three-Dimensional Communication Dilemma of Truth, Goodness, and Beauty

6.1. Truth-Seeking Dimension: The Dilemma of Fact Sharing Caused by Algorithms

Algorithmic illusions and black-box algorithms lead to distorted facts, while the responsibilities of multiple parties are unclear, making it hard to hold anyone accountable afterward. When it comes to multiple producers, it’s also unclear who is responsible, so tracking down errors is tough. AI virtual hosts face a deep para-

dox in their pursuit of technical “truth”. On one hand, their quest for “super-objectivity” helps overcome human biases and ensure accuracy, but on the other, it might create emotional and cognitive barriers that block access to deeper truths. Specifically, the mechanical feel of emotions expressed by AI hosts not only lowers the “warmth” in news delivery but also prevents their highly lifelike appearance from providing the reflective and enjoyable experience of “emotional design”. In other words, users can’t form deep emotional connections or feel cultural or value-based enjoyment while using the product. Human hosts, on the other hand, can convey a wide range of emotions and thoughts during conversations [16]. Over time, this helps establish a trustworthy and distinctive image in people’s minds that AI hosts struggle to replace.

6.2. The Kindness Dimension: The Challenges of Spreading Value Guidance in a Detailed Way

Although technological advances have enabled virtual AI anchors to be widely used in news broadcasting and improve work efficiency, AI virtual anchors are only “publishers” of news content, not “analysts”. They can only report based on set rules and data, and cannot interpret the meaning of news like real anchors who rely on their rich work experience, keen perception, and understanding of people and the world. Therefore, they are “passive” in the news production chain and lack initiative and creativity. AI virtual anchors also have limitations in adapting to context. When dealing with unexpected situations, real anchors have flexible expression and adaptability; they can quickly respond using professional experience and smoothly connect with appropriate language, whereas AI anchors depend on preset responses and struggle to react promptly to unforeseen events. Besides, most news reported by AI anchors is rather basic, usually just covering the time, place, and main facts. Although it spans social, cultural, scientific, political, and economic fields, the coverage is one-dimensional, narrated in the third person, and lacks depth.

Therefore, deeper, more personalized, and humanized news reporting still relies on the professional skills, news sensitivity, and unique perspectives of real anchors, as well as their vision, insights, imagination, emotions, and depth—core qualities that AI anchors cannot match. For AI anchors to fully replace human anchors, many technical and ethical issues still need to be addressed, which is not only a challenge for technology but also a test of journalistic ethics, social responsibility, and humanistic values.

6.3. Shangmei Dimension: The Aesthetic Dilemma of Media and Countermeasures

Most virtual broadcasting avatars on the market share a common facial parameter library, with similar designs for facial features, usually following a single soft and gentle aesthetic. This lack of diversity in visual expression can cause viewer fatigue over time and weakens the media’s image recognition. Wearing formal attire, with refined makeup and proper manners, may show professionalism and authority,

but this highly homogenized beauty makes their body, movements, and voice almost identical, making it hard for audiences to tell them apart at first glance. Even highly realistic virtual avatars still make viewers clearly aware of the difference from real people, leading to discomfort known as the “uncanny valley effect”, reducing the public’s acceptance and the influence of virtual figures. Virtual personalities are missing, and technological aesthetics overshadow the value of human personality in communication. In the 2019 issue 22 of *Youth Journalist*, Gao Ningwu and Yang Hang in their paper *Reality and Virtuality: Technological Development and Personality Evolution in Hosting and Broadcasting** focused on the debate over the relationship between “virtual personality” and “real personality” in the context of AI anchors and virtual hosts, addressing whether technological development undermines the foundation of hosting and broadcasting, which relies on personality, authenticity, and relatability, and whether virtual personality can replace that of real hosts.

Hosting and broadcasting refers to a form of communication where the broadcaster, host, or on-camera reporter acts as a personalized communicator. Essentially, it’s a mass communication approach that incorporates personality and interpersonal characteristics into the process. Personality, interpersonal interaction, and mass communication are the key components. Through the “simulated interpersonal communication” model, hosting creates an equal and interactive relationship between the communicator and the audience—a core value that AI cannot replace. Technology’s value lies in enhancing the host’s personality and guiding its evolution, ultimately achieving a positive system where “technology empowers people, and people lead communication”. Therefore, shaping a “personalized IP” is exactly how mainstream media uphold and elevate the core value of hosting in the wave of smart tech. By systematically creating an AI anchor’s “virtual personality”, the personalized and interpersonal traits of traditional hosting can extend into human-computer interactions, not only helping to build a unique brand style but also effectively promoting mainstream values in a more recognizable and approachable way.

7. Optimization Paths for AI Virtual Hosts

7.1. Customize Virtual Avatars for Different Scenarios to Break the Monotony of Aesthetic Templates

Abandon the one-size-fits-all approach to modeling and, based on different usage scenarios like short videos, in-car displays, political big screens, and cross-cultural communication, design distinctive facial features, clothing styles, and speech tones. Adapt to local aesthetic preferences for different regional audiences to create virtual IP visuals and auditory symbols with unique memorable points, addressing the issue of image homogenization from the start. AI anchors should not only clearly convey textual content but also integrate their own emotions, personalities, and language, forming a virtual persona for personalized communication, bridging the psychological gap with the public, and making news feel more relat-

able. As shown in **Figure 4**, the 2D AI anchor “Neuro” has a more “personalized” feature compared to AI like ChatGPT or Deepseek. Its live interactions aren’t mechanical responses from a pre-set Q&A database but emotionally rich exchanges on everyday topics, aiming to meet human emotional needs. Its video “Love, Death & Robots: The World Through AI Eyes” reached 2.06 million views and 10,036 comments, directly reflecting the audience’s high acceptance and emotional engagement with its “human-like” qualities, providing key reference for mainstream media exploring the personalization of AI anchors.

Finally, AI anchors need to understand and master the language-related aspects of news, such as attitudes, stances, viewpoints, perspectives, and material organization, to create corresponding language atmospheres and aesthetics. On this basis, they develop their own unique expression styles and discourse organization, which is crucial for overcoming the cold, mechanical feel of the “uncanny valley” effect and for fostering audience resonance.



Source:

https://www.bilibili.com/video/BV1P1vfB8EVj/?spm_id_from=333.1387.favlist.content.click&vd_source=570ad00f65c951745494d9bd496f29a9

Figure 4. Neuro, a two-dimensional AI virtual anchor, Love, Death & Robots: The World and Us Through the Eyes of AI.

7.2. Building a Complete Personalized Virtual Entity, Returning to the Essence of Humanistic Communication

Embed a stable and independent personality, language habits, and value stance into AI, allowing it to carry out emotionally colored two-way interactions around everyday topics; deeply interpret the attitudes and positions hidden in news texts, autonomously create a suitable language atmosphere, replicate the interpersonal communication traits of real-life hosts, and balance large-scale technical production with human emotional aesthetics to make up for the shortcomings of missing communication persona. AI anchors need to develop communication methods suitable for various scenarios. On short video platforms, the AI anchor’s reporting style should focus on being quick, fun, and with clear subtitles, grabbing the au-

audience's attention within seconds; while in in-car environments, they need to enhance voice interaction levels, achieving a "companion-style reception" of news, providing users with timely assistance anytime and anywhere. This helps increase audience engagement and interest, and also helps establish a distinctive virtual news anchor image. Through the development of different application scenarios, the use of AI anchors will become increasingly widespread, playing a bigger role in human society.

Human-computer collaboration should balance efficiency and humanistic aesthetics; multimodal emotion technology iterations can eliminate the mechanical coldness; create exclusive personalized virtual IPs and rebuild communication subjectivity. The bridge to "truth, goodness, and beauty" lies in promoting the organic combination of real-life hosts and virtual AI anchors, constructing a new production mechanism that complements "emotional depth" with "standard efficiency", achieving the unity of "personalized" and "high-efficiency" cultural communication, allowing technology to empower humanity, so that the philosophical pursuit of "truth, goodness, and beauty" still gains new expressive dimensions and wider reach in the age of intelligence.

7.3. Emotional Upgrade: Human-Machine Collaboration, Balancing Efficiency and Humanistic Aesthetics

Multimodal emotion algorithms iterate to dissolve the psychological barrier of the uncanny valley. By upgrading emotion recognition and generation technology, AI can accurately capture the underlying emotions in text, match complex micro-expressions, pauses, rhythms, and intonation, and break away from the mechanical feel of reading aloud. Different news topics are matched with suitable expressions: major reports are solemn and steady, livelihood news is gentle and friendly, and disaster reports are restrained and empathetic. Fine and natural emotional expression helps narrow the perceptual gap between humans and machines. In the era of integrated media, spoken language communication often showcases excellent Chinese culture, highlighting and promoting the unique charm and fine traditions of the Chinese language, with cultural tastes that are truthful, kind, beautiful, innovative, elegant, and refined, reflecting the character and temperament of the Chinese nation. Therefore, those presenting high-quality spoken content must be immersed in life and feel life, understand and perceive the scripts, articulate with care, and express with emotion so that truth, kindness, and beauty are woven into the modulation and melody of spoken language, giving audiences aesthetic enjoyment and delight and achieving harmony with nature, people, and society. As Lu Xun once said, "Beautiful meaning moves the heart, beautiful sound moves the ear, beautiful form moves the eye," which has become the pursuit of spoken language communicators in the intelligent media era. However, in the context of maximizing efficiency and minimizing costs in the intelligent media era, relying solely on human anchors for deep creative production and spoken language dissemination struggles to meet the challenges of massive, instantane-

ous, and cross-platform content demand; on the other hand, fully depending on virtual AI anchors makes it difficult to achieve “expressing with emotion”. Therefore, the bridge to “truth, kindness, and beauty” lies in promoting the organic combination of real hosts and virtual AI anchors, constructing a new production mechanism that complements “emotional depth” with “standard efficiency”, achieving a unity of “personalized” and “high-efficiency” cultural dissemination, empowering humanities through technology, and allowing the philosophical pursuit of truth, kindness, and beauty to gain new dimensions of expression and breadth of communication in the intelligent age.

8. Conclusion

In the context of intelligent communication, AI anchors have already been deeply integrated into the entire news gathering, editing, and broadcasting process. Their communication value revolves around the three dimensions of truth, goodness, and beauty: technology gives them extreme objectivity, flexible value communication, and immersive audiovisual appeal. At the same time, however, this also brings inherent issues like algorithmic distortion, value homogenization, and a lack of humanistic elements. To break through the current development bottleneck, we can't rely solely on technological upgrades. We need to stick to a human-centered approach while empowering it with technology, building personalized IPs, implementing human-AI collaborative review, and tailoring content to different scenarios to unite technological rationality with humanistic spirit. This study is limited to existing public cases, and future research could include more niche virtual anchors to deepen the comparative study of human-AI communication personalities.

Author Contributions

Conceptualization, Ying Zhang and Huijuan Tong; methodology, Ying Zhang and Huijuan Tong; investigation, Ying Zhang; resources, Ying Zhang and Huijuan Tong; data curation, Ying Zhang; writing—original draft preparation, Ying Zhang; writing—review and editing, Ying Zhang and Huijuan Tong; supervision, Huijuan Tong; funding acquisition, Huijuan Tong. All authors have read and agreed to the published version of the manuscript.

Conflicts of Interest

The authors declare no conflicts of interest regarding the publication of this paper.

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