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Emerging tech is remaking the media and entertainment industries—opening new business opportunities for the technologically savvy.

Designing the future of entertainment



Preface

"Designing the future of entertainment" is an MIT Technology Review Insights report sponsored by Nokia. To produce this report, MIT Technology Review Insights conducted in-depth interviews with media and entertainment executives, startup founders, industry analysts, and experts.

Adam Green was the author of the report, Teresa Elsey was the editor, and Nicola Crepaldi was the producer. The research is editorially independent, and the views expressed are those of MIT Technology Review Insights.

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Forward

Welcome to *Designing the future of entertainment*, an essential read for anyone interested in understanding how AI and other emerging technologies such as immersive volumetric video will disrupt and turbocharge the entertainment industry. Why did Nokia commission this report? The answer is simple. Our connectivity and video technologies underpin the digital entertainment industry. For example, we are a leader in the development of video compression, content delivery, and hardware technologies.

In the past 25 years, Nokia has created almost 5,000 inventions that enable streaming, online gaming, and social media platforms. We have been heavily involved in the development of all market-adopted video codecs, from the H.264/Advanced Video Coding (AVC) standard in the early 2000s to the H.266/Versatile Video Coding (VVC) standard completed in 2020. And now our talented researchers are leading the way in areas such as the next generation of video codecs suitable for compressing video for both human and machine consumption, immersive video and haptics standardization.

As the report concludes, these and other open standards covering technologies such as streaming protocols, file formats, and voice recognition are the soft infrastructure behind all digital entertainment. You couldn't stream a video or play an online game without them. And they will be even more important as XR becomes mainstream.

If you take away one thing from this report, I hope it is the following: if your business is not using the latest video compression standards then you should make the switch. Newer video compression technologies are more energy and cost efficient. They reduce data storage - with content taking up half as much space - and deliver improved user experience through enhanced compatibility and interoperability across platforms and devices.

I hope you find the report useful. And if you would like to discuss the findings with me or our award-winning video research team then please do get in touch via LinkedIn.

Arvin Patel, Chief Licensing Officer New Segments, Nokia



Executive summary

n entertainment revolution, powered by Al and other emerging technologies, is fundamentally changing how content is created and consumed today. Media and entertainment (M&E) brands are faced with unprecedented opportunities – to reimagine costly and complex production workloads, to predict the success of new scripts or outlines, and to deliver immersive entertainment in novel formats like virtual reality (VR) and the metaverse. Meanwhile, the boundaries between entertainment formats – from gaming to movies and back – are blurring, as new alliances form across industries, and hardware innovations like smart glasses and autonomous vehicles make media as ubiquitous as air.

At the same time, media and entertainment brands are facing competitive threats. They must reinvent their business models and identify new revenue streams in a more fragmented and complex consumer landscape. They must keep up with advances in hardware and networking, while building an IT infrastructure to support AI and related technologies. Digital media standards will need to evolve to ensure interoperability and seamless experiences, while companies search for the right balance between human and machine, and protect their intellectual property and data.

This report examines the key technology shifts transforming today's media and entertainment industry and explores their business implications. Based on in-depth interviews with media and entertainment executives, startup founders, industry analysts, and experts, the report outlines the challenges and opportunities that tech-savvy business leaders will find ahead.



Key findings include the following:

· Al is turbocharging media production and democratizing the creative process, but it also poses substantial threats and challenges for the industry. Entertainment is moving from cautious experiments to wider-scale deployment of AI. So far, use cases include audience predictive analytics, virtual production, automating tasks like editing and captioning, and powering efficiency improvements in areas like animation and dubbing. While welcome in high-cost, high-risk industries like film and TV, these shifts are just the beginning: more radical AI-driven innovations could unlock new revenue streams, democratize content creation, directly threaten certain media sectors like advertising and graphic design, and test the concepts of creativity, intellectual property, and authenticity. Adopters should view AI as an intelligent partner, not a replacement; human creativity will remain critical to developing content and stories that resonate. Experimenters must carefully manage data leakage and IP protection as they work with external AI models.

• Hardware, infrastructure, and connectivity will be crucial enablers of next-generation content. Key technical advances supporting new forms of content include edge and on-device processing improvements and the bandwidth and speed to enable multi-user and interactive experiences. Improved connectivity and device innovation will be key to delivering nextgeneration content and experiences. Companies need to invest in and manage Al-related business processes and IT, including producing high-quality data, continuously optimizing Al models, and maintaining applications effectively. • Digital media standards underlie every advance. Digital media technologies and standards are the soft infrastructure behind all digital entertainment, and they will be essential to more complex, interactive, and "live-ish" experiences of the future, including gaming, sports/esports, music, and the metaverse. Technologies and standards for video compression, media formats and metadata, video streaming, and voice recognition are key to today's digital media ecosystem – and standards for emerging technologies including immersive volumetric video and the metaverse will enable tomorrow's. Businesses need to embrace a new generation of standards to support innovation, interoperability, and user experience.

· Media and entertainment brands have often been tech vanguards, but they also struggle to reorient their business models during these transitions. Brands should forge new alliances, take an expansive view of their ecosystem to include non-traditional partners and think creatively about routes to monetization. From algorithm-powered personalization to computer-generated virtual effects, the M&E industries have a rich history of experimenting with - or even driving the development of - emerging technologies. The chips powering today's AI revolution, for example, have their origin in gaming. But industry incumbents have often struggled to anticipate the degree of business model reinvention these wider technology shifts require. Learning the lessons of the dotcom and streaming revolutions, entertainment and media brands need to anticipate the wider shifts in business models and pinpoint the threats. Now is an opportune moment to strike the right commercial partnerships to safeguard revenues, open new avenues, and thrive.

Businesses need to embrace a new generation of standards to support innovation, interoperability and user experience.





The AI accelerator

edia and entertainment brands have been early and avid adopters of AI, especially since the emergence of generative models. The effects have been nothing short of stunning: Studios are leveraging machine learning to automate timeconsuming tasks like color correction. OpenAI and Meta have both released models that create and edit videos based on text prompts. Meta's Movie Gen allows creators to generate sound effects, soundtracks, or videos showing facial features and human emotions based on a single human portrait (see Figure 1).

Creators are using large language models (LLMs) to develop scripts, generate ideas, and push the limits of visual storytelling. Viduttam Katkar, a professor of visual effects at Seneca Polytechnic, says that emerging production technologies will enrich the slate of films reaching audiences. "We will now start seeing a more diverse range of content creators and filmmakers. It's not going to completely replace the traditional form of filmmaking, but more sci-fi, abstract visions will have a much better [chance of] being brought to life," says Katkar. One YouTube survey found that 89% of independent creators on the platform believe AI will level the playing field with professional production studios.¹

For the big studios, meanwhile, predictive analytics is helping de-risk development spending by forecasting likely audience responses. Warner Brothers has partnered with Cinelytic to use predictive models to guide investments by predicting the potential success of movies and movie stars across regions.² The startup StoryFit is using AI to help studios understand audience responses to scripts.

Figure 1: Generative AI adoption in media

A majority of companies are exploring generative AI to improve efficiency, increase monetization, and expand customer experience.



Source: Compiled by MIT Technology Review Insights, based on data from 2024 Digital Trends - Media and Entertainment in Focus, Adobe Business, 2025³

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Viduttam Katkar, Professor, Seneca Polytechnic

Gaming leads the way

The gaming sector, a revenue bright spot in the media landscape, is investing heavily in Al-powered production. Electronic Arts says Al will impact 60% of its game development and improve responsiveness and customization.⁴ Al-enhanced games can respond to individual player behavior and skills to customize the gaming experience, with generative Al creating personalized characters and items.

When Epic Games implemented features to enhance personalization and dynamic play modes, they increased user engagement by 20% and player retention by 15%.⁵

Al-based intelligent non-player characters (NPCs) enhance realism by introducing unpredictable behavior by in-game characters and expanding choices and pathways for players. "What you're offering a user is infinite replayability, because each user will have a unique experience," says Katkar. "This, in turn, increases the value of your delivered content."

Noah Levine, global head of media and entertainment at Databricks, sees generative AI–enhanced NPCs as "infinitely more compelling than one constrained to 10 lines of responses or actions" and notes the potential for generating new storylines based on their engagement with the player.

Stories worth telling

Streaming services have long used big data for insights on whether their shows might be a hit. Take Netflix, which launched the popular political drama House of Cards in 2013, after crunching numbers on the past work of its cast and director.⁶ A decade later, AI is being used to improve scripts and tell studios whether stories are worth investing in.

StoryFit, an American startup, uses predictive analytics to assess how a script is likely to resonate with an audience, helping studios refine their characters and plots and mitigate the risks of a flop. In an industry where millions are poured into rights and production, such insights on a script's marketability are valuable, says the company's founder and CEO, Monica Landers. "StoryFit predicts audience reaction from the script stage, so it's a much more affordable place to have discussions, make changes, or rethink a piece," she explains.

StoryFit's technology works by compiling data on different elements of storytelling, including various

character traits, and correlating them with audience preferences. Its models draw on thousands of scripts, as well as insights from behavioral scientists, to generate insights on a story's efficacy. The aim is not to churn out generic plots, says Landers. "Successful films hit the norms and expectations of an audience, but they also surprise them," she says. "Those surprises can be measurable."

For now, StoryFit's customers are large studios, though Landers says she expects this to change as AI costs fall, making the technology available to independent creatives. She argues that tools like hers will not replace humans in storytelling, but should be used in partnership with them. "When we were first selling into the media six years ago, companies had expectations that AI would be the complete solution," she says. "But to use AI right now, especially in creative spaces, it needs to be an intelligent partnership. Having an easy backand-forth between AI and humans is where the real success will be." Interactive experiences, he says, could "have simulated famous characters interact with the user in a storyline to create a unique experience for them. This is a radical departure from the static story arcs that exist today."

Innovations in gaming are in turn feeding back into other media verticals via their shared software, platforms, and chips. "The emergence of real-time rendering technologies such as Unreal Engine have revolutionized the way filmmakers are creating content," Katkar says, "especially because the filmmakers can now visualize the scenes in real time, enabling far more creative freedom, as well as more dynamic and flexible onset scheduling and shooting processes."

Al-driven customer experience

Al adoption is not limited to production, though. Media brands are also using it to improve consumer experience, starting with the use of algorithms to enhance content discovery and viewer engagement. Netflix, for example, uses machine learning recommendation engines that enable the discovery of up to 80% of personalized content watched on the platform, while saving the company over \$1 billion annually through improved customer retention and engagement.⁷ Instagram uses machine learning to populate its Explore page,⁸ and Snapchat and TikTok provide users with AI toolkits to add effects, filters, and masks to their photos and videos.⁹

Social media companies are also leveraging AI to improve content governance. AI models detect over 90% of hate speech content Facebook removes from its platform.¹⁰ YouTube uses AI to detect music and video copyright infringements, and the company is developing models to identify AI-generated content impersonating artists and creators.¹¹

All told, McKinsey estimates that generative Al could unlock \$80 billion to \$130 billion of economic value in media and entertainment.¹² But in order for the industry to capture that, it will need to innovate and develop hardware, infrastructure, connectivity, and standards – as well as reinvent its business models yet again.





ext-generation content – especially new forms driven by AI – will require significant new infrastructure to produce, distribute, and consume. Savvy media and entertainment organizations will look to invest in these foundations ahead of time, to support experimentation and enable their future ambitions.

Producing content

Al might seem ethereal, but it requires physics to work: servers, chips, and energy inputs. Al workloads require high-performance hardware in the form of graphics processing units (GPUs), integrated circuits like neural processing units (NPUs), and data centers. The high demand for this hardware is not likely to plateau: Katkar predicts a "cat and mouse game" as hardware innovations unlock new capabilities for creators, whose experiments and boundary-pushing in turn require further performance improvements.

The substantial energy demands of AI are particularly large for visual media. Generating videos with models like Sora takes vastly more computation than creating text from LLMs.¹³ Using AI to generate one image uses as much energy as the average smartphone needs for a full charge.¹⁴ Even with innovations improving the efficiency of model inference, the energy required to power AI models remains tremendous. From developing smartphone edge algorithms to power intelligent NPCs to using powerful cloud GPU clusters to generate character animations, energy optimization will be a new and significant challenge for media companies.

Beyond the chips and compute to run AI workloads, entertainment producers are using a range of new tools to capture content, from high-speed cameras to object and range detectors such as LiDAR sensors. "Onset motion capture, onset data capture, face capture, and all of those emerging technologies have come together, including LiDAR scanners, time-of-flight sensors, and high-speed cameras," explains Katkar.

To benefit from AI, entertainment companies also need to manage AI-related business processes and IT infrastructure behind the scenes: maintaining high-quality data, optimizing model selection and training, and deploying and maintaining AI applications effectively. An AI video-compression algorithm, for instance, needs to be optimized for deployment in a smartphone application for end users, while an AI color-grading algorithm for editors can be deployed on a cloud system.

"To use AI right now, especially in creative spaces, it needs to be an intelligent partnership. Having an easy back-and-forth between AI and humans is where the real success will be."

Monica Landers, Founder and CEO, StoryFit

Additionally, companies will need to make big bets on their AI strategies, identifying, for example, when to train their own machine learning models and when pretrained models are sufficient.

Delivering content

Connecting media producers with audiences requires steady improvements in hardware, software, telecommunications networks, and industry standardization – and AI is helping to join the dots. Streamers are using AI to deliver and adjust content quality based on the device used, for example, and connection speeds and advanced compression algorithms are integrated at the edge – closer to the user – to optimize streaming speed and quality.

The vast volumes of data transferred across telecommunication networks require constant innovations in delivery. As streaming demands increase – YouTube, for example, gets one billion hours of views daily¹⁵ – AI can optimize the use of network resources. Companies like Netflix invest in video-encoding technologies to optimize streaming quality based on available resources, using neural networks to improve video quality and reduce latency.

These tools work by encoding source videos into compressed formats for faster transmission across networks and then decoding the transmitted files to reproduce a high-quality version of the original source video file. Al has revolutionized these approaches for Netflix and other platforms with its ability to process vast amounts of data in a self-learning approach that adapts to different media types.¹⁶

Consuming content

Delivering next-generation media content smoothly to consumers also requires end-user hardware innovation, such as the integration of NPUs in smartphones and personal devices to run AI models locally on device rather than on a cloud server via the internet.¹⁷ NPUs let devices run algorithms for tasks like capturing a professional-looking portrait with smartphone cameras or implementing advanced content upscaling on smart TVs.¹⁸ Entertainment innovators will thus encounter complex technical challenges all the way to the device and user level.

Connecting media producers with audiences requires steady improvements in systems, networks, and industry standards – AI is helping to join the dots.

Tim Levy, co-founder of Twyn, a platform that allows consumers to interact with digital twins of celebrities, thinks on-device processing will unlock novel business models. "To deliver our technology platform to users, we are reliant on connectivity. We use speechrecognition models, LLMs, and video databases, all of which are off-device. If you don't have a decent connection, we can't deliver our product. Ultimately that's all going to be on-device, which is going to profoundly change the types of experience that people can have locally wherever they are anywhere in the world."

Ville-Veikko Mattila, head of multimedia technologies at Nokia, highlights the potential for computation to be split between edge and cloud processing in the emerging media landscape. "Part of the media processing could happen at edge," he says, "and then you are able to share the computational load between your device and the edge network."

The latest generations of smartphone processors and smart home devices are increasingly optimized for AI workloads that need to operate within thermal and power constraints while delivering the high performance needed for demanding AI applications, prompting innovations in chip design, and the development of more efficient architectures optimized for edge deployment for speed, energy efficiency, and security. Going forward, further improvements will be critical to delivering optimal user experience in wearable devices like VR and mixed-reality (XR) headsets, where a multitude of computational processes take place in real-time to orchestrate sensors and cameras.



etworks and hardware alone are not enough to enable vast volumes of data to move across networks and deliver media seamlessly from producers to consumers: digital media standards are the soft infrastructure that underlie digital entertainment. Standards for technologies including video compression algorithms and multimedia codecs, streaming protocols, voice recognition, file formats, and metadata are enabling today's digital media ecosystem. And standards for emerging technologies including volumetric and immersive video and the metaverse will enable tomorrow's.

Standards reflect technical specifications, algorithms, or formats used to encode media of different types, and each generation of standards allows performance enhancements and surfaces new use cases. Bit rate (the amount of data transmitted per unit of time) in video streaming, for instance, has been reduced by up to 50% in video compression standard H.266, compared to its predecessor, H.265.¹⁹ This reduces the file size of a 4K movie, lowering the required cloud storage and accelerating the download speed required for streaming while keeping the quality the same.



Reduced file sizes enable the distribution of large video files with average home internet-connection speeds. As Mattila explains, "You may watch 4K video on Netflix requiring 50 Mbps connection, which should be fine for your home connection. But the raw data rate, before video coding, is about 6,000 Mbps, which would be far too much to distribute to people at scale."

Amitabh Dixit, chief technology director for multimedia and new segments at Nokia, outlines the impact of compression: "Let's say you choose a 4K movie, and you just press play and it starts streaming. But if you were to stream the same three-hour 4K movie in its uncompressed format, it would take roughly 15 days for you to stream it. But with H.265 video compression technology, which is able to compress content by more than 800 times or even higher, you can do it at the click of a button."

Keeping pace with modern standards

Constantly modernizing standards lead to expanded reach with lower costs. "There's always a requirement that when we move to the next-generation standard, it is able to provide 50% compression gain," says Mattila. "And if that could be applied globally, it would mean a

"A consumer metaverse is difficult to realize, because that's when the environment is really open. A lot of different independent parties will contribute to that kind of metaverse, and that's where the role of standardization comes into play."

Amitabh Dixit, Chief Technology Director for Multimedia and New Segments, Nokia

very significant impact to the amount of data needed to transmit; that impacts power savings, because there's less data to be transmitted."

"Using older technologies is not as energy efficient," agrees Dixit, adding that media companies "need to wake up to the possibility, or the reality, that it's the right time to move to a more recent technology, which works better – and is better for the environment." There are cost savings for them in doing so. "You can use a 20-year-old technology, but with a newer compression standard, you will end up with a smaller bitstream," he says, "which eventually saves you a lot of cost in data storage with content taking up half as much space."

As such, media and entertainment brands that are not currently using modern digital media standards should investigate the shift. In addition to savings in energy and cost, building the right standards infrastructure allows businesses to showcase their content with improved media quality, it improves user experience via better compatibility and interoperability across platforms and devices, and it future-proofs content for new uses, including cross-industry partnerships or collaborations as media experiences grow more complex and immersive.

Experts say that in the future new digital media standards will be required to enable interoperability as the boundaries between media formats blur with, for example, the consumer metaverse or streaming entertainment into autonomous vehicles.



Connecting the metaverse

Next-generation experiential media, such as VR and the metaverse, will require infrastructure innovations and harmonized standards to balance computation, processing, network optimization, and interoperability. VR experiences require real-time processing using sensors, cameras, animations, and multiple AI models running concurrently.

"Moving to a metaverse, which is a multi-user experience where we can create content, but we are also in continuous interaction with others, where everything you do should be reflected to other people in the metaverse, requires low-latency interaction and capability to share the experiences in real time to all," explains Ville-Veikko Mattila, who directs the multimedia technologies unit at Nokia. Achieving this low latency requires powerful on-device and edge processing, operating on highly efficient networks with sufficient levels of connectivity.

Amitabh Dixit, chief technology director for multimedia and new segments at Nokia, explains that the expanding cast of players in the metaverse space will need to collaborate to create a user-friendly metaverse. The development of standards will be crucial to achieving this. "A consumer metaverse, where you and I will sit in our living room and be transported to a virtual world, is difficult to realize, because that's when the environment is really open," he says. "A lot of different independent parties will contribute to that kind of metaverse, and that's where the role of standardization comes into play."

The Metaverse Standards Forum is bringing together a multitude of working groups to lead on these issues, ensuring bridges across the many emerging use cases in areas including human interface, financial transactions, rendering, and identity management.



ver the last several decades, the media and entertainment industries have been early and eager adopters of the latest technology, from the computer-generated imagery (CGI) used to create visual special effects to the algorithms that personalize content recommendations on streaming platforms.

The covid-19 pandemic spurred further innovation in the digital sector and provided revenue to boot. As live venues closed and consumers were forced to quarantine at home, they dramatically increased digital media use (see Figure 2). Streaming and gaming boomed, with online global video subscriptions soaring 26%, to more than 1 billion in 2020.²⁰ Digital platforms began to host the release of big blockbuster movies and shows and invested heavily in their own content creation. Live-streaming services exploded, as artists broadcast virtual concerts and hastened the integration of augmented reality into shows.

The industry was quick to adapt. As physical filming shut down, virtual production allowed filmmakers to harness advanced computer graphics and real time rendering to generate virtual sets, adaptable in real time. Al tools for content creation and post production became widespread and cloud platforms allowed remote editing, bringing new efficiencies to costly work.



Source: Compiled by MIT Technology Review Insights with data from PwC Global Entertainment & Media Outlook 2024-2028, 2025²¹



Figure 3: Social media has overtaken traditional media as a news source

Innovation requires business strategy

Yet, despite this impressive record in tinkering with emerging tools, these industries have often underestimated the wider implications of technology phase changes, such as the dot-com boom or the advent of streaming. Their lack of a larger business strategy around these technology changes has severely muted their ability to profit from them – or sometimes even to survive them.

In the early 2000s, many brands lacked a clear digital business model and simply produced large volumes of free content. Ben Bird, leader in media and entertainment at PwC, says this early misstep has proven hard to fix. "You let the genie out of the bottle at that point," he says. "In the last ten years people have been trying to put that genie back and get consumers to pay for content."

The traditional press is battling declining advertising revenue, with social media overtaking news websites as the primary source of online news during the pandemic (see Figure 3). With circulations falling, publishers have shuttered and layoffs have come thick and fast. In visual media, entertainment giants have written-down billions of dollars in assets and laid off thousands of staff as the shift from cable television to streaming services reverberates through the industry.²³ Even the tech companies that underwent hiring frenzies during the pandemic have cut back. Since 2022, they have come under pressure from a cocktail of inflation and the return of consumers to their regular lives. Hundreds of thousands of employees have been laid off, including in media and entertainment verticals like streaming and gaming services.²⁴ Animation studios and production companies have also suffered cuts and downsizing.



"IP holders need to preserve future revenue rights as large language models and other models gain traction, because the future is very hard to predict."

Noah Levine, Global Head, Media and Entertainment, Databricks

Companies are seeking to monetize their content through subscriptions, freemium advertising-led services, or a la carte paid offerings.²⁵ Flexibility and evolution are key. Netflix has successfully combined a subscription model, tiered pricing, in-app advertising, content and distribution partnerships, and datadriven behavioral analytics to grow its market share.²⁶ Micropayments have taken root in the gaming industry for in-game upgrades, cosmetic enhancements, or virtual currency.²⁷ But it's not only tech-first media and entertainment brands that have found revenue models for the digital age. The New York Times now makes twice as much from digital subscriptions as it does from print.²⁸

The decisions ahead

It is also clear that there are important business and legal decisions to make in relation to AI as the industry grapples with issues including data protection, intellectual property (IP), and copyright. An infringement lawsuit between the New York Times and OpenAI over the latter's use of content to train its AI models has been judged a litmus test for the sector.²⁹ Some publishers, including Vox Media, TIME, and News Corp, have responded by signing strategic partnership deals that grant OpenAI access to their content.³⁰

Levine believes partnerships are an effective way for IP holders to safeguard revenue prospects. "IP holders need to preserve future revenue rights as large language models and other models gain traction, because the future is very hard to predict," he says. Levine argues that IP holders should be cautious of data "leakage," referring to instances where users may inadvertently input sensitive data into an AI model. Partnering with AI firms that place a high priority on data security and ownership is therefore instrumental in minimizing this risk. Alliances can help transform M&E companies into more rounded media businesses. Disney's \$1.5 billon equity stake in Epic Games, for example, is a signal of the former's intent to gain a foothold in next-generation gaming experiences, such as the metaverse.³¹ Epic's games platforms provide "a ready-made build and distribution solution for a media company [Disney] that is out-of-position in terms of internal technical knowhow," says Jamie MacEwan, senior media analyst at Enders Analysis.

The sports sector offers inspiration for finding new strategies via collaborations and partnerships, with its bundling of immersive live experiences, contextual advertising, brand sponsorship, merchandise, e-commerce products, podcasts, exclusive content, fantasy sports leagues, and video-game franchises all helping create revenue-rich spaces.^{32,33}

The power of stories

These industries can harness AI to save on production, but Ben Shields at MIT Sloan School of Management warns that the industry must not lose sight of its core value proposition: compelling stories. "If it doesn't resonate with the audience and capture their time," he says, "it's going to be very difficult to monetize it."

Some fear that involving AI in content ideation will threaten the industry's economic viability by replacing human storytelling, but Shields disagrees. "I believe human storytelling will be resilient as we move into the AI age," he says. Tim Levy of Twyn also doubts that AI will replace the writers that are the lifeblood of these sectors. "Authenticity, ownership, and accuracy matter," he says. "We need to use these AI tools to preserve and leverage the human voice, so people can have authentic relationships."

Conclusion

ncumbent entertainment and media brands have learned from past transitions, such as the dot-com era and the dawn of streaming, that ignoring or trying to oppose emerging technologies could hinder their businesses for decades. While they are understandably nervous about the threat posed by technologies like generative AI, they cannot ignore these seismic changes. They must now find ways to integrate these novel capabilities with their own brand value – and some secret sauce – to thrive.

Whichever choices are made – and much depends on the individual business and its market – these industries have weathered many storms. In the early 1940s, Disney was one step from ruin as it battled strikes and commercial flops.³⁴ Pixar came back from the brink of financial collapse.³⁵ And just two years ago, Netflix lost nearly a million subscribers due to intensifying competition and cost-conscious consumers, wiping \$200 billion from its market capitalization.³⁶

Quick action followed at Netflix, from cracking down on password-sharing to launching advertising, live experiences, and sports experiments.³⁷ The turnaround served up a reminder that tech excellence alone is nothing without a well-formulated, adaptive business strategy.



This research aims to inspire entertainment and media brands to find the business strategy that makes the most of this moment of technological revolution. Key takeaways for business leaders include the following:

• Al is already delivering wins – while posing farreaching threats and opportunities for the industry. The moment for Al adoption is here, but while celebrating its successes, organizations must also pause to think through its long-term and far-reaching effects on their business, industry, and brand.

- The transition will be technically demanding. Investments in hardware, infrastructure, connectivity, and standards will underpin media businesses' success with today's challenges and through to tomorrow's.
- Technology adoption is necessary but not sufficient. The history of the industry is clear: enthusiastic adoption of game-changing technology is not enough to propel a business to success – or even ensure its survival – when not accompanied by an equally revolutionary business strategy.

"If it doesn't resonate with the audience and capture their time, it's going to be very difficult to monetize it."

Ben Shields, Senior Lecturer, MIT Sloan School of Management

Endnotes

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