

History of Digital Watermarking



1950s Invention of Watermarking

The concept of watermarking begins with Emil Hembrooke's 1954 patent, introducing the embedding of identification codes into music.

1990s Rise of Watermarking

The 1990s witness a surge in watermarking due to concerns over copyright infringement with the proliferation of digital media and the internet.



1990s-2000s Commercialization and Research Progress

Watermarking finds applications in transaction tracking, proof of ownership, and broadcast monitoring. Academic research contributes to refining watermarking techniques.



2000s-2020s Digital Era of Watermarking

Watermarking transcends its original purpose, with applications in broadcast monitoring, device control, and enhanced media interaction.



2020s-today The Future of Watermarking

Watermarking holds vast potential in content authentication, blockchain-based rights management, and enhanced interactive media experiences.



Mid 2020s and future Content Authentication and AI

Watermarking plays a crucial role in distinguishing authentic content from AI-generated content.



Present-Future Standardization and Challenges

Ongoing standardization efforts emphasize watermarking's value despite persistent challenges related to security and standardization.

