











REVIEW

## Critical Thinking in the Information Age: A Systematic Review on the Role of MIL and Information Overload

### Pensamiento Crítico en la Era de la Información: Revisión Sistemática sobre el Rol de la AMI y la Saturación Informativa

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**Cite as:** Chara-De Los Rios T, Bejarano-Álvarez P, Poma-Cornejo H, Quispe-Munares M, Reyes-Contreras K. Critical Thinking in the Information Age: A Systematic Review on the Role of MIL and Information Overload. *Seminars in Medical Writing and Education*. 2025; 4:448. <https://doi.org/10.56294/mw2025448>

Submitted: 22-08-2024

Revised: 24-01-2025

Accepted: 27-06-2025

Published: 28-06-2025

Editor: PhD. Prof. Estela Morales Peralta 

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#### ABSTRACT

**Introduction:** in a context marked by information overload, critical thinking and media and information literacy (MIL) have become essential for effectively understanding and evaluating information.

**Objective:** to analyze and synthesize the most recent scientific literature on critical thinking, media and information literacy (MIL), and information overload. The aim is to identify the relationships among these concepts, their educational and social implications, and the strategies that contribute to strengthening critical competencies in information-saturated contexts.

**Method:** a systematic review of scientific literature published between 2019 and 2024 was conducted. Empirical, theoretical, and review studies addressing the relationship between critical thinking, MIL, and information overload were selected. A qualitative analysis was applied to group themes, identify patterns, and detect trends and gaps in current research.

**Results:** media and information literacy is a key skill to mitigate the negative effects of overload and to enhance critical thinking. Educational interventions that integrate MIL have proven effective in improving the ability to critically assess information. Moreover, information overload can be addressed through innovative and contextualized pedagogical strategies.

**Conclusions:** it is concluded that MIL is fundamental for the development of critical thinking in a context dominated by information overload. Education must respond with innovative methodologies and tools that incorporate both digital and traditional literacies, considering the social and technological factors that influence access to and processing of information.

**Keywords:** Critical Thinking; Media and Information Literacy (MIL); Information Overload; Critical Education; Digital Competencies; Information Evaluation.

#### RESUMEN

**Introducción:** en un contexto marcado por el exceso de información, el pensamiento crítico y la alfabetización mediática e informacional (AMI) se vuelven esenciales para comprender y evaluar la información de manera eficaz.

**Objetivo:** analizar y sintetizar la producción científica más reciente sobre el pensamiento crítico, la alfabetización mediática e informacional (AMI) y la saturación informativa. Se busca identificar las relaciones entre estos conceptos, sus implicaciones educativas y sociales, y las estrategias que contribuyen a fortalecer competencias críticas en contextos saturados de información.

**Método:** se realizó una revisión sistemática de literatura científica publicada entre 2019 y 2024. Se seleccionaron estudios empíricos, teóricos y de revisión que abordaron la relación entre pensamiento crítico, AMI y saturación informativa. Se aplicó un análisis cualitativo para agrupar temas y encontrar coincidencias, así como para identificar tendencias y vacíos en la investigación actual.

**Resultados:** la alfabetización mediática e informacional es una habilidad clave para mitigar los efectos negativos de la saturación informativa y para potenciar el pensamiento crítico. Las intervenciones educativas que integran AMI han demostrado mejorar la capacidad de evaluación crítica de la información. Además, la saturación informativa puede ser contrarrestada mediante estrategias pedagógicas innovadoras y contextualizadas.

**Conclusiones:** se concluye que la AMI es fundamental para el desarrollo del pensamiento crítico en un contexto marcado por la saturación informativa. La educación debe responder con metodologías y herramientas innovadoras que integren tanto alfabetización digital como tradicional, y que consideren los factores sociales y tecnológicos que influyen en el acceso y procesamiento de la información.

**Palabras clave:** Pensamiento Crítico; Alfabetización Mediática e Informacional (AMI); Saturación Informativa; Educación Crítica; Competencias Digitales; Evaluación de la Información.

## INTRODUCTION

In today's digital era, the overabundance of information has given rise to a phenomenon known as information overload, which affects people's ability to process and evaluate information critically. A report by OpenText reveals that 80 % of workers worldwide experience information overload due to fragmented data and poor information management.<sup>(1)</sup>

Moreover, the growing reliance on technologies such as generative artificial intelligence raises concerns about the decline of human cognitive skills. Experts warn that excessive use of tools like ChatGPT may erode critical thinking and creativity by fostering dependency that reduces the mental effort required to solve problems and learn.<sup>(2)</sup>

The lack of skills to identify false or misleading information is another significant challenge. A global survey conducted by MediaWise indicates that approximately 75 % of adults do not feel very confident in identifying misinformation, and 60 % are very or extremely concerned about AI-generated content.<sup>(3)</sup>

In Chile, a recent study reveals that although news consumption has increased, so has distrust in the media. The ideological segmentation of audiences has created information bubbles, where individuals consume content that reinforces their beliefs while avoiding opposing perspectives. In addition, 75 % of Chileans fear that artificial intelligence will increase the spread of fake news.<sup>(4)</sup>

In Colombia, although programs have been implemented to improve educational quality, challenges remain in developing students' critical and analytical skills. Exposure to digital content without proper guidance can hinder the development of the critical thinking necessary to discern truthful information.<sup>(5)</sup>

In Peru, internet penetration reached 71,1 % of the population in 2023, with over 24 million users. However, media and information literacy (MIL) has not advanced at the same pace. The concept of MIL is not included in the national school curriculum, limiting the development of critical skills in students.<sup>(6)</sup>

UNESCO has emphasized the importance of developing MIL competencies, especially among young people aged 15 to 24, who represent 80 % of internet users in the country. Initiatives such as "A Mí No Me La Hacen" and the video game "Infodemic" aim to promote media literacy and address digital misinformation.<sup>(7)</sup>

Furthermore, studies conducted in Peruvian universities have shown a positive correlation between media literacy and critical thinking among education students. However, the lack of integration of MIL in teacher training programs limits the development of these competencies in the educational field.<sup>(8)</sup>

### Justification and need for Media and Information Literacy (MIL), information overload and critical thinking

This research responds to the urgent need to understand how Media and Information Literacy (MIL), information overload, and critical thinking interrelate within contemporary educational and social contexts.<sup>(9,10,11)</sup> As digital environments become the primary sources of information for millions of people, the ability to distinguish between true and false content has become essential.<sup>(12,13)</sup> However, empirical evidence shows that large sectors of the population, especially young people and students, lack the cognitive and educational tools to face this challenge. The lack of critical and media skills not only limits informed citizen participation but also increases vulnerability to ideological manipulation, misinformation, and polarization. This systematic review is necessary to rigorously group, synthesize, and analyze existing research, identify knowledge gaps, and propose concrete courses of action aimed at strengthening critical thinking in times of information overload.<sup>(14)</sup>

### Academic, Educational, and Social Relevance

The development of this research is highly relevant at both theoretical and practical levels. Academically, it contributes to consolidating an up-to-date body of knowledge on the relationship between Media and Information Literacy (MIL), information overload, and critical thinking, facilitating access to organized and categorized findings for future research. In the educational sphere, this research is crucial for teachers, curriculum designers, and policymakers, who will have access to systematized evidence supporting the inclusion of MIL as a cross-cutting component in teaching and learning processes. Socially, this review is especially valuable as it contributes to the formation of citizens with greater capacity to evaluate, compare, and reflect on the information they consume, reducing the impact of phenomena such as post-truth, emotional manipulation, and digital extremism. Furthermore, in a context where artificial intelligence and content automation are becoming increasingly prominent, critical education becomes an essential 21st-century competency.<sup>(15,16)</sup>

### Constructivist Theory

Media literacy is based on the theory of constructivism and active participation. Both Piaget and Vygotsky believe that students actively construct knowledge, which is essential for media literacy.<sup>(17)</sup> Media requires individuals not only to consume information but also to analyze, interpret, and restructure it according to their cultural and social context.<sup>(18)</sup> Vygotsky's social theory of Social Constructivism, according to Drotner et al.<sup>(19)</sup>, emphasizes the importance of social context and language in learning, which is key to media literacy. Media learning requires social interaction and shared understanding of messages, which fosters critical and collaborative skills.<sup>(20)</sup>

Media literacy is conceived in this context as the ability to understand, interpret, and critically relate to news and discourse in digital formats, in order to foster teachers' critical thinking in conjunction with their digital competencies.<sup>(21)</sup> The role of teachers is essential for students to effectively strengthen their media skills. According to Altamirano<sup>(22)</sup>, when teachers possess these skills and recognize the importance of media literacy, they are better equipped to prepare their students to effectively use technological media.<sup>(23)</sup>

Van De Vord<sup>(24)</sup> argues that the adaptation of educational institutions to a digital environment and their proper management is a matter of great importance that should be a priority for political, economic, and social decision-makers. According to Li et al.<sup>(25)</sup>, media education implies that students actively engage in exploration and research using digital content for communicative purposes.<sup>(26)</sup> This practice not only facilitates the learning and understanding of curricular content but also promotes greater awareness among students of the need to continue developing their media skills.<sup>(25)</sup>

According to Mateus et al.<sup>(27)</sup>, media education has not occupied a priority place in school training in our country. It is essential to train teachers so that they can take advantage of digital tools and guide their students in this new scenario.<sup>(22)</sup>

### Critical Pedagogy Approach

The approach aimed at examining and modifying educational systems that maintain social inequalities was developed by<sup>(28)</sup>, who proposes that traditional education is similar to a depository process, where students are passive recipients and teachers deposit knowledge. However, Freire advocates for a dialogic and participatory education. Regarding the theory of pedagogy as liberating praxis,<sup>(29,30)</sup> it maintains the idea that teaching should empower students to question and transform their social reality.

This educational approach has gained global relevance due to the growing impact of the media on the formation of opinions and social behaviors.<sup>(31)</sup> The United Nations Educational, Scientific and Cultural Organization<sup>(32)</sup> took the first step toward global media education in 1982 with the Grunwald Declaration. Likewise, the urgency of training future generations to interpret and value the information they consume is highlighted, emphasizing the importance of incorporating media literacy into educational curricula at all levels.<sup>(8)</sup>

Instead of viewing bureaucracy as a burden, we can reimagine it as an opportunity to enrich pedagogical practices. By integrating administrative processes into our daily work, we can avoid monotony and foster creativity both personally and in students.<sup>(33)</sup> It is essential that we motivate our students to transcend the role of mere recipients of information and turn them into active agents of change.<sup>(34,35)</sup> By providing them with the appropriate tools, students can play a crucial role in transforming their environment. Through dialogue, reflection, and joint action, we can cultivate critical minds and citizens committed to their communities.<sup>(36)</sup>

### Literacy and Schooling: The Technological Components of Literacy

Traditionally, literacy instruction in schools and higher education has emphasized reading and writing as key skills; however, the rise of digital communication technologies has reconfigured these competencies.<sup>(3,31,37)</sup> The shift to digital forms poses additional challenges, particularly as young people increasingly begin their literacy journey on screens before moving to paper, reversing the pattern of previous generations.

Brief textual interactions, the use of abbreviations, and the use of small screens for urgent reasons challenge traditional notions of written language.<sup>(38)</sup> According to Suarez et al.<sup>(28)</sup>, even basic tasks such as online research

have transformed literacy practices, demanding rapid and thoughtful reading, selectivity, and ways of filtering relevant information from distractions.<sup>(39,40)</sup>

The decline of conventional forms, such as letters and telegrams, and the development of mediated communication through social media represent a shift in the very definition of communication. Social media favors brevity and immediacy over depth and argumentation. This research examines the current challenges of MIL through a systematic and theoretical review that analyzes methodological approaches, theoretical frameworks, and gaps in literature.

### **Epistemological and Methodological Challenges of the Review**

The development of this systematic review is not without methodological and conceptual challenges. First, simultaneously addressing three complex variables—MIL, information overload, and critical thinking—requires the articulation of multiple disciplines such as education, communication, cognitive psychology, and information science. This multidisciplinary requires rigorous theoretical integration to avoid conceptual contradictions and achieve a holistic understanding of the phenomenon.<sup>(13,41)</sup> Furthermore, the lack of consensus on the definitions of key terms represents a significant limitation, as different studies use different nomenclatures, such as digital literacy, media literacy, or cognitive overload, which can affect the comparability of findings. Another significant challenge is access to and rigorous selection of valid scientific sources, as the proliferation of studies not peer-reviewed or published in predatory journals can distort conclusions if a critical assessment of methodological quality is not performed. Finally, the speed with which the digital information ecosystem evolves means that many studies quickly become obsolete, necessitating special consideration of the most recent publications and the adoption of well-defined time criteria.<sup>(42,43)</sup>

### **Methodological Approach of the Systematic Review**

To address the stated objectives, the methodology of a systematic review of scientific literature was chosen, using the PRISMA (Preferred Reporting Items for Systematic Reviews and Meta-Analyses) protocol as a guiding framework. This methodology guarantees a transparent, reproducible, and rigorous process of searching, selecting, evaluating, and synthesizing previous research. The review began with the formulation of the research questions that guided the analysis, followed by the definition of the inclusion and exclusion criteria, which limited the sample to peer-reviewed academic articles published between 2015 and 2025 that explicitly addressed one or more of the main variables. The databases consulted were Scopus, Web of Science, ERIC, Scielo, and Google Scholar, using Boolean operators and controlled descriptors such as “media literacy,” “critical thinking,” “information overload,” “misinformation,” “digital competence,” among others. The selected articles were evaluated for their methodological quality, conceptual clarity, theoretical coherence, and thematic relevance. Finally, the findings were coded and thematically analyzed, allowing for the identification of recurring patterns, predominant methodological approaches, and gaps in literature. This was achieved with the goal of constructing a critical and integrated overview of the state of knowledge in this field.<sup>(14,44,45)</sup>

## **METHOD**

This research adopts a documentary approach, conducting a systematic review of the scientific literature to analyze the relationship between Media and Information Literacy (MIL), information overload, and critical thinking in educational and social contexts. To ensure transparency, rigor, and reproducibility, the PRISMA (Preferred Reporting Items for Systematic Reviews and Meta-Analyses) protocol was applied, which structures the search, selection, evaluation, and synthesis of scientific studies.

### **Inclusion criteria**

- Scientific articles were published between 2020 and 2025.
- Empirical, theoretical, and/or mixed studies related to the study variables.
- Peer-reviewed publications available in full text.
- Studies in Spanish, English, and Portuguese.
- Articles indexed in reliable academic databases: Scopus and Web of Science.

### **Exclusion criteria**

- Duplicate or non-academic works (blogs, non-refereed conferences, unpublished theses).
- Publications prior to 2020.
- Studies not directly related to the variables under study.
- Documents that did not offer clear empirical and/or theoretical evidence.

The systematic search was conducted between March and April 2025, using key terms and Boolean operators such as:



(“media literacy” OR “media literacy”) AND (“critical thinking” OR “critical thinking”) AND (“information overload” OR “information saturation”), with variations depending on the database.

Initially, 327 scientific articles were identified. After applying automatic and manual filters according to the inclusion and exclusion criteria, studies were eliminated due to duplication, lack of relevance, year of publication, and lack of access to the full text. Finally, 78 scientific articles were selected for detailed analysis and interpretation, meeting the standards of quality and thematic relevance, as shown in figure 1.

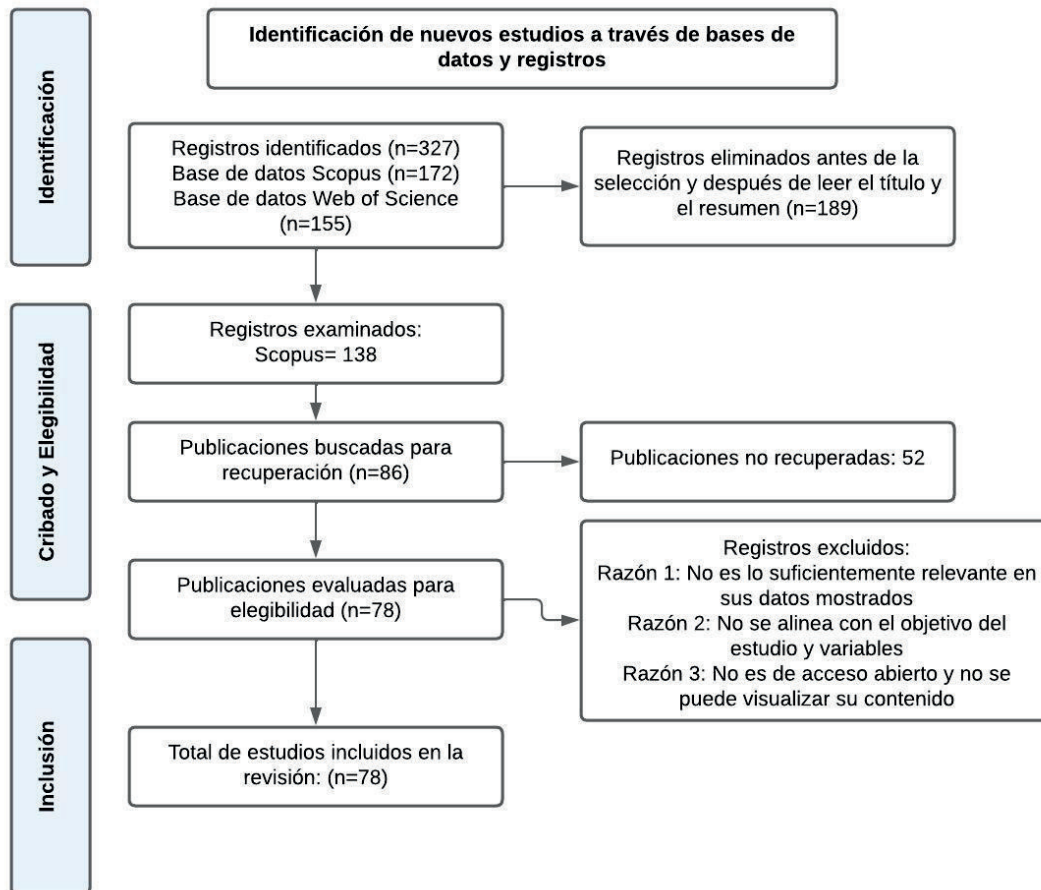


Figure 1. PRISMA Flowchart

## RESULTS AND DISCUSSION

### MIL and Critical Thinking in Formal Education

A significant portion of the reviewed literature agrees on the close relationship between media and information literacy (MIL) and the development of critical thinking in educational settings. For example, Herrera-Lillo and Urrejola-Contreras<sup>(9)</sup> analyze the level of digital competence in health science students, highlighting the need to integrate critical thinking as a cross-cutting component of professional training. Likewise, Mango-Quispe et al.<sup>(8)</sup> emphasize that initial teacher training in Peru still lacks a robust pedagogical strategy for developing critical skills mediated by MIL, which limits the ability of future educators to navigate information-saturated environments.

In the context of elementary and secondary education, Luo et al.<sup>(10)</sup> and Chesire et al.<sup>(46)</sup> present successful pedagogical interventions, such as the Superpowers Program and Informed Health Choices, which have demonstrated positive impacts on the development of critical judgment from an early age, even in low-resource contexts such as the Philippines or Kenya. These results are complemented by the findings of Suárez-Perdomo et al.<sup>(28)</sup>, who conducted a systematic review of how adolescents build their media literacy in school environments, revealing uneven progress according to region. Finally, Afrilyasanti et al.<sup>(16)</sup> show how integrating media literacy into English classes can transform teaching towards a more critical and reflective pedagogy.

### Information Saturation and Disinformation

A second body of research focuses on the impact of information saturation and disinformation, increasingly common phenomena in digital contexts. Wang et al.<sup>(11)</sup> propose a deep learning model (BERT-LSTM) to improve

users' ability to identify fake news on mobile networks, highlighting the urgency of designing technological tools that support information literacy. Along similar lines, Molina et al.<sup>(44)</sup> explore the neurophysiological basis of disinformation processing, finding that brain complexity is reduced when people process false content, which could directly affect critical judgment.

Lipińska et al.<sup>(13)</sup>, analyze UFO-related conspiracy theories, exposing how certain authority figures are exploited to legitimize unsubstantiated information. These narratives contribute to information saturation and erode public trust in scientific knowledge. Finally, Zimmermann and Tomczyk<sup>(47)</sup>, warn that adolescents are constantly exposed to contradictory content on social networks, which requires a stronger training intervention to avoid misinformation and cognitive exhaustion.

### Resilience and Media Literacy

A third line of analysis revolves around digital resilience as a key competency for addressing information overload. Naeem et al.<sup>(12)</sup> review strategies used by university students to navigate social media safely and critically. Their findings suggest that digital resilience, understood as the ability to adapt and respond critically to the information environment, is becoming an essential skill in higher education.

This approach is also reflected in Matthews et al.<sup>(48)</sup>, who discuss the design of digital devices that promote curiosity and social interaction from childhood, which could lay the foundation for more critical media literacy. In another context, Aremu et al.<sup>(49)</sup> highlight that digital skills directly influence university academic performance in Nigeria, showing that digital literacy and cognitive resilience go hand in hand. Finally, Hecht et al.<sup>(50)</sup>, examine how ideological factors, institutional distrust and gender affect the perception of digital citizenship and civic education in the United Kingdom, demonstrating that resilience also implies a critical stance towards political and media discourse.

### Emerging Technologies (AI, AR, Video Games) and Critical Thinking Skills

A significant portion of the reviewed research emphasizes how emerging technologies can be used to enhance critical thinking and other 21st-century skills. Liamruk et al.<sup>(14)</sup>, developed an augmented reality game that improves cultural and cognitive competencies, while Zhang and Miao<sup>(45)</sup> explored how immersive technologies such as AI, AR, and virtual reality foster engagement and motivation in English as a foreign language learners.

In the field of gamification, Wang et al.<sup>(41)</sup> and Wu et al.<sup>(51)</sup> show that educational video games, when combined with formative assessment systems such as two-tiered tests, can activate metacognitive processes and complex thinking skills. On the other hand, studies such as Kooli et al.<sup>(52)</sup> warn about the potential risks of excessive use of generative AI, while Oliveira et al.<sup>(53)</sup> evaluate how students perceive the critical thinking stimulated by these technologies.

The proactive approach of Mack et al.<sup>(54)</sup> and Pant<sup>(38)</sup> is also highlighted, who defend the need for a balance between human interaction and technology, while Sakitri et al.<sup>(31)</sup> relate technological use with professional preparation in the 4.0 era. In general terms, these studies show that technology can be an ally of critical thinking if used with pedagogical intentionality, although its implementation must consider ethical, cognitive and emotional aspects.

### Acceptance and Perception of the Use of Technologies

Finally, some research focuses on the acceptance and perception of the use of educational technologies by students and teachers. Rap et al.<sup>(43)</sup> examine how technology acceptance influences the teaching of climate change, revealing that the level of trust in digital tools affects teacher engagement. Zhou et al.<sup>(42)</sup> conduct a bibliometric review that shows the exponential growth of online project-based learning and its implications for critical thinking.

Meanwhile, Slimi et al.<sup>(15)</sup> and Haroud et al.<sup>(37)</sup> investigate student and teacher perceptions of generative AI, finding that while its usefulness for repetitive and support tasks is recognized, there is skepticism regarding its role in developing critical thinking. Trust, institutional context, and the level of digital literacy are determining factors in the adoption of these technologies.

This group of studies highlights that the psychological and cultural disposition toward technology is as important as infrastructure or access, and that critical thinking cannot fully develop if educational stakeholders do not understand or trust the available tools.

Table I below summarizes some relevant aspects based on the studies found, considering that the topics related to the variables analyzed have been broken down.

The findings of this systematic review are critically relevant in a global context marked by the massive proliferation of information, misinformation, and the increasing use of smart technologies. The identification of 78 recent scientific studies (2020-2025), selected using the PRISMA criteria, provides an updated and rigorous overview of how MIL and information overload directly or indirectly impact the development of critical thinking at different educational levels and sociocultural contexts. This empirical evidence is essential for informing future public policies, educational programs, and pedagogical strategies based on real and consistent data.

**Table 1.** Table of comparison of scientific articles

Thematic line	References	Main topic	Coincidences / Detailed observations
MIL and Critical Thinking in Education	(8,9,10,16,28,46,55,56,57,58,59)	Assessment and development of critical thinking and media and information literacy in students.	All studies agree that media literacy (MLI) improves critical analysis skills, particularly in the face of fake news and manipulated content. For example, <sup>(8,16)</sup> highlight its role in initial teacher training and English language teaching, while <sup>(46)</sup> demonstrates how structured health programs enable sustained improvements in critical judgment. <sup>(10)</sup> highlights MLI even from the preschool level. Together, they suggest that early and sustained educational intervention is key.
Information saturation and misinformation	(11,13,44,47,60,61,62,63)	Impact of misinformation and information overload on decision-making and cognitive development.	Information overload is observed to generate confusion, reduce attention, and impair the quality of critical judgment. <sup>(11)</sup> applies models such as BERT-LSTM to mitigate this, while <sup>(44)</sup> offers neurophysiological evidence of how misinformation affects cognitive complexity. <sup>(13)</sup> connects belief in conspiracy theories with a lack of critical thinking, and <sup>(47)</sup> suggests that adolescents should be provided with tools to filter the volume of digital content. They agree that not only access to information is required but also training in discernment.
Digital resilience	(12,29,48,49,50,58,63,64,65,66,67)	Skills to navigate critically and safely in digital environments.	Digital resilience emerges as an emerging skill in the face of the complexity of the information environment. <sup>(12)</sup> identifies useful strategies among university students, while <sup>(49)</sup> links digital skills with better academic performance. <sup>(48)</sup> indicates that, from childhood, friendly digital environments that enhance curiosity and critical thinking should be promoted. <sup>(50)</sup> provides a social perspective: institutional trust and ideological thinking also influence how these skills develop. In short, everyone agrees that digital resilience is essential but underestimated in educational policies.
Emerging technologies (AI, AR, games, apps)	(14,15,31,38,41,45,47,51,52,53,54,68,69,70,71)	Using AI, AR, video games, and other technologies to develop critical thinking, creativity, and 21st-century skills.	<sup>(14,45,51)</sup> show that immersive technologies and AI can be powerful allies in fostering motivation and critical thinking, provided they are used for clear purposes. <sup>(38,41)</sup> advocate for active and well-balanced learning experiences. However, <sup>(52)</sup> warns about a new form of addiction to generative AI, and <sup>(53)</sup> detects ambiguous perceptions in students regarding the use of these tools. All agree that technology does not guarantee critical development per se, and must be mediated by conscious pedagogical design.
Technological perception and acceptance	(15,33,35,37,42,43,72,73,74,75)	Attitudes and perceptions of students and teachers about AI and technology in education.	There is a direct relationship between the perception of usefulness, institutional trust and willingness to use educational technologies critically. <sup>(15,37)</sup> find that students accept AI when they perceive support and usefulness, while <sup>(43)</sup> analyzes how climate change can be a catalyst issue for accepting technology. <sup>(42)</sup> points out that technological adoption continues to grow but still lacks critical integration. They agree that acceptance depends on institutional, emotional and cognitive factors and that critical thinking must be developed alongside technological familiarity.

Furthermore, the results highlight a common thread: media and information literacy acts as a positive catalyst for critical thinking, providing students and citizens with cognitive and metacognitive tools to analyze, interpret, and evaluate information reflectively. At the same time, it is confirmed that information overload, when not properly managed, erodes critical thinking, induces confusion, and facilitates the spread of erroneous beliefs, especially among populations with less media literacy. These conclusions not only reaffirm the study's initial hypotheses but also reveal an urgent need for curricular interventions at all educational levels.

Finally, the importance of these results lies in their multidimensional nature and practical applicability. It is not only a matter of understanding an academic phenomenon, but also of proposing viable solutions to a problem that affects both personal development and collective and democratic well-being. Strengthening MIL and developing institutional mechanisms to mitigate the effects of information overload are key measures to ensure a critical and resilient citizenry capable of making informed decisions. Consequently, this review provides not only scientific knowledge but also strategic input for designing contextualized, sustainable, and evidence-based educational interventions.

## CONCLUSIONS

The systematic review conducted has allowed us to identify and analyze a significant body of recent scientific studies that demonstrate the close relationship between media and information literacy and the development of critical thinking in current educational and social contexts. It is concluded that MIL is a fundamental component for providing individuals with the cognitive skills necessary to discern the quality and veracity of information in a data-saturated environment.

The results indicate that information overload represents a growing challenge that negatively affects people's critical thinking skills, generating confusion, cognitive overload, and greater vulnerability to misinformation. However, this saturation is not an irreversible determining factor, as the acquisition and strengthening of MIL skills can counteract its adverse effects.

It is highlighted that educational interventions that incorporate specific media and information literacy strategies significantly improve the analytical, evaluative, and critical thinking skills of students and other social groups. Therefore, it is essential to integrate MIL programs transversally into formal curricula and continuing education activities. The reviewed studies also highlight the need to adapt teaching methodologies and tools to current technological and cultural contexts, considering the rapid evolution of digital platforms and the diversity of information sources. Innovation in curriculum design must consider both traditional and digital literacy to respond to the challenges of the information age.

Another relevant conclusion is that the development of critical thinking does not depend exclusively on individual skills, but is conditioned by social, institutional, and technological factors. The interaction between information overload and media literacy is part of a complex ecosystem where education, technology, and public policy must converge.

Regarding future research, we recommend further longitudinal and experimental studies that allow for a more precise assessment of the long-term effects of MIL interventions on critical thinking, as well as exploring innovative models that incorporate artificial intelligence and adaptive learning.

Finally, this review contributes to the construction of a conceptual and practical framework that can guide educators, researchers, and public policymakers in designing effective strategies that promote an informed, critical, and resilient citizenry in the face of the challenges of information overload in the contemporary world.

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#### FINANCING

The authors did not receive financing for the development of this research.

#### CONFLICT OF INTEREST

None.

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