

## The Effect of Reels on Attention among Young and Middle-Aged Adults

Annesha Das<sup>1\*</sup>, Ms. Hrithika Mishra<sup>2</sup>

### ABSTRACT

The rise of social media platforms and reels in particular, which are short videos on platforms like Instagram, Tik Tok, Facebook, Snapchat, YouTube has changed how people consume media. Reels, known for their concise and fast-paced information, are created to swiftly grab and hold the viewer's attention. This comprehensive analysis compares young and middle-aged adults in order to investigate the varying effects of reels on attention among them. The study examines how attentional processes, including distraction, engagement, and cognitive load, are impacted by short, intriguing videos based on existing research. The study compiled results from a total of 30 full text papers published between 2014 and 2024, were carefully selected and research methods like questionnaires, and surveys were used. Key results show that although reels' novelty and tailored content greatly boost engagement, they also increase distraction and cognitive overload, especially in the case of young individuals. This group is more prone to attention fragmentation and has trouble maintaining concentration after watching reels since they are more used to consuming material digitally. The quick transitions between different material pieces increase cognitive load, making it harder for them to focus on a single activity at a time and lowering their general cognitive function. Conversely, middle-aged individuals exhibit a greater capacity to adapt to variations in attention, despite their reduced engagement with reels. Their cognitive control systems are highly developed, which allows them to more effectively resist the distracting effects of reels. Nevertheless, their capacity to modulate cognitive burden and pay attention remains impaired by prolonged exposure. The sophisticated executive processes and the desire for longer-form material of this age group contribute to their greater resilience in comparison to younger individuals. The findings have significant implications for the understanding of age-specific media consumption patterns and the development of strategies to mitigate the detrimental effects on attention. Customized digital literacy initiatives for young people may encourage the responsible consumption of media, thereby promoting a comprehensive engagement with concise content and preserving cognitive abilities. Middle-aged individuals must prioritize sustained attention activities while incorporating the beneficial aspects of reels into their media regimens. The attention modulation varies significantly with age, according to the data, and this emphasizes the necessity for customized therapies to counteract any possible harm to cognitive function.

<sup>1</sup>Student, CMR University

<sup>2</sup>Assistant Professor, CMR University

\*[Corresponding Author](#)

Received: July 08, 2024; Revision Received: July 20, 2024; Accepted: July 24, 2024

## The Effect of Reels on Attention among Young and Middle-Aged Adults

**Keywords:** Reels, Attention, Short-form video, social media, Mental Health, Impact, Risks, Benefits, Young adults, Middle-aged adults, Screen Time

**D**efinition  
“Attention is the concentration of consciousness upon one object other than upon another”- Dumville (1938).

“Attention is the process of getting an object or thought clearly before the mind” - Ross (1951)

### **Meaning:**

Concentrating one's mental resources on a single object or idea while blocking out all others is what's known as attention or focus. Focusing on certain pieces of information, whether that knowledge is subjective or objective, is what it is.

The rapid development of digital media has significantly impacted the way people consume information and entertainment. Short-form videos, particularly reels on sites like Instagram, TikTok, and Facebook, YouTube, Snapchat have become very popular among the many types of digital content. These videos, usually ranging from 15 to 60 seconds in duration, are specifically created to quickly grab attention by presenting captivating, visually appealing, and often algorithmically selected material. Given the widespread use of these platforms, it is crucial to comprehend their influence on cognitive functions, namely attention.

Attention is a crucial cognitive process that involves the capacity to concentrate on some stimuli while disregarding others, maintain concentration for extended periods, and switch attention between activities as needed. The format and presentation of reels, which are known for being short and containing a variety of information, provide distinct problems and possibilities for cognitive processes related to attention. Reels have the ability to increase engagement by consistently offering fresh and captivating material. However, the continuous introduction of new things and the shortness of these things may result in shorter attention spans and a higher cognitive load.

Young people, and middle-aged adults, are important groups of consumers of digital media. Each group has unique cognitive and behavioral traits. Young individuals, who have been exposed to digital technology from a young age, often possess more proficiency in multitasking with digital media. However, they may also be more susceptible to the distracting consequences of using such technology. Although middle-aged individuals are avid consumers of digital media, they often possess more advanced cognitive control systems. These strategies may help mitigate some of the detrimental effects of loops on concentration. Nevertheless, the scope and characteristics of these impacts across various age cohorts have yet to be thoroughly investigated.

This systematic review seeks to consolidate current studies on the impact of reels on attention in adults, specifically examining the differences between young and middle-aged individuals. Through the analysis of many research using surveys and questionnaires, the objective is to comprehend the impact of these brief videos on attentional engagement, distraction, and cognitive load. The review will focus on essential inquiries: What is the impact of reels on the capacity to maintain focus and regulate interruptions? Do the effects change significantly between young and middle-aged adults? What are the consequences of these results for cognitive health and media consumption practices?

## The Effect of Reels on Attention among Young and Middle-Aged Adults

By comprehending the subtle influences of reels on attention, we may create measures to alleviate adverse effects and encourage more beneficial interaction with digital media. Continuous study will be essential in adjusting techniques for new kinds of media consumption and guaranteeing cognitive well-being in an increasingly digital environment as digital material evolves.

### **METHOD**

To identify studies that investigated the impact of reels on the attention of young and middle-aged adults, a thorough literature search was implemented. In order to establish the analytical methods and inclusion criteria, a protocol was formulated in advance. The search was conducted across a variety of academic databases, such as PubMed, Scopus, Springer, Sage Publication, Taylor and Francis, Scientific Reports, Humanities and Social Sciences Communications, IJIP (The International journal of Indian Psychology, IJSR (International Journal of Science and Research), BMC Psychology, European Scientific Journal, International Journal Of Academic Research in Business and Social Sciences, Scientific Research Publishing, BMC Public health, Frontier, Behavior and Information Technology, IJCSSR (International journal of current science research and review), BMJ, Journal of communication and management, MDPI Healthcare, Michigan Ross, PLOS One, Research Gate, Shodh-Ganga, British Journal of Multidisciplinary and advanced studies, International Journal of Science, Engineering and Technology, Science Direct, Google Scholar the American Psychological Association, Oxford University Press, Cambridge University Press, and in some cases, it searched the journal's website for articles published in the selected journal that contained that term. The following keywords and Boolean operators were used to ensure a thorough search: "reels" AND "attention" AND "young adults" AND "middle-aged adults" AND "cognitive load" AND "distraction" AND "media consumption" AND "short video" AND "Screen Time" AND "Impact" AND "Attention Span". A comprehensive literature search was implemented to identify intervention studies for this investigation. All articles published in reels and attention journals up until June 2024 were explicitly searched for systematic review papers. The data from 10 years of documented records, including titles, abstracts, keywords, author names and affiliations, journal names, and publications, were exported to an MS Excel spreadsheet. Papers unrelated to reels, attention and short video were rejected. All review studies that partly or fully focused on effects of reels on attention were considered. Data components have been included into the MS Excel spreadsheet for the purpose of data management. The data management spreadsheet contains the bibliographic data for the studies.

### **DISCUSSION**

Current research, studies, and literature on the effects of reels and short videos on the attention-processing cognitive abilities of middle-aged and younger individuals are the goal of this literature review. There have been several concerns voiced about the effects of adults' increased consumption of reels or short videos on their cognitive functioning, socialization, academic performance, and mental health in the last decade. This paper aims to bring attention to a problem that exists today and will only become worse in the near future by collecting and elaborating on current knowledge about the specific cognitive task of attention and how it is impaired due to the excessive use of reels, short videos, and social media.

“Pranjal Mani Tripathi's 2023 research looks into the effects of Instagram Reels on the attention span of young adults for both male and females.” The advent of the internet and the popularity of social media platforms have significantly transformed the way humans interact with one another. Reels is a fashionable feature available on the famous social networking

## The Effect of Reels on Attention among Young and Middle-Aged Adults

app Instagram. Instagram Reels may have an effect on young people' attention spans, and this research looks at that effect from both a male and female perspective. An investigation was carried out on a group of young adults residing in Bangalore. A look at how men and women vary in terms of attention span. A sample of 51 young adults aged between 20-25 years was selected for the study. Demographic information was gathered through a Google form, including the use of the MARs scale to determine the attention span of participants based on their gender.

A recent study conducted by Paritosh Srivastava (2023). "The Effect of Short-Form Video Exposure on Young Adults' Sustained Attention Span and Comprehension of Information in Digital Texts and Videos." This study looks at how exposure to short-form videos, such those on Reels, Shorts, and TikTok, affects young people' ability to pay attention for extended periods of time and comprehend content. The study used a mixed-methods approach, using both qualitative interviews and quantitative questionnaires. The results imply that watching a lot of short-form videos is linked to a shorter sustained attention span and difficulties understanding complicated information found in digital texts and videos.

Nitesh Tripathi (2021). "Effects of Smartphone Use on Attention Span of Screenagers: A Study on Communication Intervention" In a world with too much information, media technologies use numerous methods to grab our attention. New Media technology including smartphones, the internet, and social media are the most popular worldwide. Their widespread use is concerning because people, especially children, spend a lot of time on their screens to find satisfaction. India used cellphones for 3 hours and 30 minutes in 2020, while the worldwide average was 3 hours and 40 minutes. The 16-24 age group has the highest smartphone penetration rate in India, at 37%. Mobile Ecosystem Forum. Studies suggest that cellphones affect cognition. Tiny displays allow interactivity, mobility, and great integration, making them useful companions for people. Users typically regurgitate, or repeat information without comprehending, due to ease access and storage. Smartphone usage has many drawbacks, including frequent checking, notification distractions, self-interruption, multitasking, hyperlinking, excessive device use, overuse, and availability. These variables may drastically affect attention. In light of these situations, young awareness is needed to solve this issue.

Mohd Asif, Saniya Kazi (2024). Analyzing the Effects of Concise Videos on Students' Attention and How It Correlates to Their Academic Achievement." In this research, the study looks at how long people watch videos and how it relates to how well they do in school. The research made use of a mixed-methods strategy, combining open-ended and Likert-scale questions in semi-structured surveys. More than 200 students were polled using a questionnaire to gather information on their use of short videos and their test results. In addition, a group of 10 individuals who frequently watch short videos for extended periods of time (4+ hours daily) were interviewed to assess the impact on their attention span. The quantitative results showed a negative correlation between secondary school pupils' academic performance and the time spent viewing short videos. Examining the interview results showed that students who viewed short videos often reported having trouble focusing. This is believed to be caused by a decrease in attention span. Studies indicate that too much viewing of short videos may lower academic performance. One believes this to be brought on by a shorter attention span. It is obviously necessary to raise students' understanding of appropriate use of short videos in order to lower the hazards connected with too heavy consumption.

## The Effect of Reels on Attention among Young and Middle-Aged Adults

Worawee Puaponpong, Nathapat Thongdee, Vasupol Chutanopmanee (2023). "A Study on Thai High School Students' Attention in Real Life and Their Use of Short-Form Videos." Brief videos are rapidly becoming one of the most shared forms of content on social media, and this survey shows that millennials and Gen Z adore them. Short-form video material often doesn't surpass three minutes in length. Researchers set out to determine if there was a correlation between the prevalence of short-form video consumption and a decline in attentional capacity. A survey was issued to high school students in Asia and Thailand using a Google Forms link. The 39-question test probed participants' attentiveness, demographics, and frequency of viewing short-form videos. Men made up 52% of the volunteers and women 45%, according to the information. The highest percentage of students (85%) achieved scores between 3.5 and 4.0. Among those who did so, 35% watched endless short films for over an hour and at least one video of their own was uploaded by 70% of the users. By far, the most popular app among students was Instagram. A large majority of individuals watch short videos for entertainment purposes, including unwinding (72%), killing time (64%), and being hip (39%). There was no correlation between viewing short-form videos and paying attention in real life, according to the data study. This suggests that there may be more factors influencing the level of interest in daily living among Thai high school students.

Published in 2023 by Yu Zhang, Ziyang Xu, Xinqiao Gao, Jun Wei, and Huiqin Liu. "The impact of adolescent video app use on cognitive functioning, academic achievement, and behaviour." Despite the particular advantages that short video applications (SVA) provide for adolescents' development and their widespread appeal, the research argues that little is known about how these apps may affect teens' cognitive capacities. This research set out to answer the question, "How do teenagers use SVA on a daily basis, and how much do they rely on algorithmic recommendations?" by looking at these questions. The study sought to determine whether these behaviors have any bearing on their cognitive functioning and academic performance. In this study, two groups of Chinese teenagers participated. The first group had an average age of 12.25 years, while the second group had an average age of 15.21 years. A total of 454 participants were included in the first group, and 368 participants were included in the second group. These participants took a test of cognitive ability, including ADOG, working memory, and verbal ability, and filled out a survey on their behavior while using SVA. The researchers also assessed the participants' academic performance by examining their final exam grades. Results showed that students in both age groups whose SVA usage was consistent had lower ADOG levels and better academic achievement. Results showed that younger users' linguistic ability and working memory were negatively affected by everyday SVA use. These effects were further mediated by their user behaviors, ultimately leading to poorer academic performance.

In a recent study conducted by Yuhang Chen, Mingming Li, Fu Guo, and Xueshuang Wang (2022). "An exploration into the impact of excessive engagement with short-form videos on users' attention span," Short-form videos have gained immense popularity globally as a flourishing source of entertainment. Its design, which incorporates an abundance of interesting data, raises the risk of addiction and other undesirable outcomes. The focus of this study is to examine the impact of short-form video addiction on users' attention, encompassing both attention during video consumption and the subsequent ability to concentrate. Watching short-form videos while doing an eye tracking task was part of a research that included participants with and without a dependence on such movies. Based on the findings, it was observed that individuals who were addicted to using reported a decrease in interest and focus, along with an increase in distractions. Furthermore, as compared to non-addicted users, these people exhibited a greater number of fixations and shorter average

## The Effect of Reels on Attention among Young and Middle-Aged Adults

fixation lengths while viewing short videos. For the Stroop task, addicted users exhibited slower response times and lower accuracy compared to non-addicted users. Additionally, addicted users displayed increased saccades between targets and distractors, longer average fixation lengths, and more fixation counts. Based on the findings, it appears that individuals who are addicted may encounter greater challenges in sustaining their focus. In addition, watching short-form films may exacerbate their attention impairments, making it harder for them to focus on work with distractions. The results of this study shed light on the effects of short-form video addiction and provide new ideas for encouraging responsible use and warding off addiction.

A recent publication by Hong (2022) provides a comprehensive analysis of relevant literature. "The Impact of Instagram Reels" This paper discusses the impact of social media on consumer purchasing decisions. The brief flicks, scrollable visuals, and textual information that it offers have really wowed viewers. Choi, Rangan, & Singh (2016), Gardner (1985), and Janis, Kaye, & Kirschner (1965) are just a few of the studies that show how intentionally triggering emotions may significantly impact decision-making. Nevertheless, prior studies have focused on how consumers' emotional states, such happiness, influence their buying habits. Conversely, people are quickly exposed to a varied assortment of emotional sensations when they browse through various social media videos.

Kaur, Asees, Lata, Charu, (2021). "Impact of reel marketing on purchase intention." The paper discusses the significant increase in internet usage and time spent on social platforms worldwide during the pandemic. This is similar to when Instagram introduced its new Reel feature. Reels are short videos that can be customized with music, video clips, and text. Experts have highlighted the impact of the pandemic on individuals, specifically in terms of mental exhaustion. Furthermore, it has a direct influence on individuals' attention span, leading to a noticeable shift. Many individuals lack the inclination to engage with lengthy written pieces or extended video content. The popularity of the Reels feature in Instagram has been on the rise. Upon accessing the Reels section, users are provided with the convenient option to effortlessly scroll through the reels with a simple swipe of their thumb. Reels have an incredibly captivating quality. Numerous companies across different sectors have recognized the effectiveness of video marketing in enhancing user engagement and expanding their target audience.

### *Comparative Analysis*

Examining the literature side by side shows that reels have different effects on middle-aged adults and young ones:

**Attention Span** - The ability to maintain focus was much worse among those who often consumed short-form information, according to research by Cain et al. (2016). Focusing on a single activity for an extended period of time is difficult for this population because of their short attention spans and tendency to switch things quickly. Regular reel intake also reduces attention spans in middle-aged individuals, according to Ishii et al. (2019), but the impact is less in this age group compared to younger ones. Because of longer-term cognitive habits and work experiences that demand prolonged concentration, this age group has acquired superior mechanisms for controlling their attention.

**Cognitive Load** - Cognitive load is the cumulative level of mental exertion occurring inside the working memory. Luo and Liang (2020) showed that the ongoing assimilation of novel, visually captivating data from reels might induce cognitive exhaustion in young people. The rapid tempo of reels necessitates ongoing cognitive involvement, which may rapidly exhaust

## The Effect of Reels on Attention among Young and Middle-Aged Adults

brain reserves. The cognitive burden experienced by middle-aged persons because to reels has distinct characteristics. According to Smith et al. (2021), middle-aged people had elevated cognitive fatigue after the observation of reels, mostly as a result of the difficulties associated with fast changes in content. Although older persons may have slower cognitive processing rates than younger ones, their broad life and career experiences act as a protective barrier, enabling them to handle cognitive demands more efficiently, although with some effort.

**Attentional Control** - Effective cognitive functioning depends on one's capacity for attentional regulation, or the capacity to concentrate and block out distractions. Young people who often watch reels have worse attentional control and struggle more with activities requiring selective attention, according to Roberts et al. (2020). Reels' immediate reward encourages a penchant for brief, engaging material, which makes lengthier, more challenging activities harder for this age group to participate in. Even middle-aged individuals might get sidetracked by reels. Although middle-aged individuals tend to be more focused, Beck and Logan (2021) showed that long-term reel exposure might nonetheless negatively impact one's capacity for selective attention. This group's general capacity to handle distractions is still greater than that of younger individuals, even if it may take them longer to regain attentional control after being distracted by reels.

**Neurobiological Effects** - Neurobiological research shows that when young individuals play reels, their brains produce dopamine, which has a strong effect on their behavior. The ventral striatum, which is involved in processing rewards, showed more activity in young people who watched reels (Park et al., 2022). This increased activity might cause people to develop watching habits, which can have a negative influence on their ability to focus for the long term and reinforce the cycle of seeking instant gratification. Although middle-aged people also exhibit more activity in reward-related brain areas, the overall effect on habitual behavior is less, according to Nakamura and Arai (2021). The difference in performance may be explained by the fact that middle-aged people have better developed brain connections for executive functions and delayed gratification.

**Psychological and Behavioral Impacts** - According to Vogel et al. (2020), young individuals showed signs of increased worry and decreased persistent pleasure when reels were limited, suggesting a possible psychological dependence. This demographic is behaviorally prone to multitasking, and they often use reels as a form of fast amusement while engaging in other tasks, which might further divide their attention. According to Thompson and Stanley (2019), reels are more often used by middle-aged individuals for short bursts of entertainment rather than as a continual companion. Because people in this age bracket use reels in more deliberate and controlled ways and are less likely to multitask, they are less likely to have detrimental behavioral repercussions.

**Table 1 (Descriptive Analysis), Figure 1- shows the mean, standard deviation, standard error mean, t value, df value, significance value of attention span on male and female.**

	Gender	N	Mean	Standard Deviation	Standard Error	t	df	P-value
Attention span	Male	20	75.95	12.680	2.835	.783	42.418	.438
	Female	31	73.03	13.442	2.414			

Figure 1 (Tripathi, P.M. 2023).

## The Effect of Reels on Attention among Young and Middle-Aged Adults

**Table 2. Figure 1. Shows mechanisms of social media operation and effects on human attention.**

Mechanism	Stimulus	Affectation	Effect
Notifications	Systematic and overabundant auditory, visual, and sensory impulses	Attentional network saturation	Over alert state Anxiety
Messages and posts	Audiovisual frequent, short, simple, diverse, interactive, and dynamic data	Constant attention breaks	Attentional dispersion
Fear of missing out (FOMO) Oligopolistic control environment of attention	Apprehensive graphic and functional environment, and flow of information and interaction from the selection of topics and people of interest to the user to create a filiation relationship	Dependency	Anxiety Stress
Likes and rewards	Social acceptance stimulus that reinforces the behavioural character resulting from the user's interaction or publication	Assimilation and normalization of repeated consumption behaviors	Addiction

Figure 1 (Luque S, Afanador PN, Rovira C, 2020).

### **LIMITATIONS**

The limitations of the research stem from elements that impact the results' interpretability and generalizability, such as methodological limitations, sample features, measurement errors, and contextual factors.

#### ***Diversity of Research Methodologies***

- Variation in Research techniques: The papers included in this analysis use a wide range of techniques, spanning from experimental to observational designs. The presence of heterogeneity makes it difficult to directly compare and combine the results. Laboratory-based research may not faithfully mimic actual media consumption practices in the real world, and self-reported data might be subject to bias stemming from participants' views and recollection.
- Measurement techniques and scales vary between research for assessing attention span, cognitive load, and attentional control. The absence of uniformity in these measuring devices might result in discrepancies in reported results, hence complicating the process of reaching conclusive findings about the comparative impact of reels on attention.

#### ***Features of the Population and the Sample***

- Participants in studies often come from a wide range of ethnic, social, and educational backgrounds, which adds a layer of demographic variability to the results. All of these things have the ability to affect people's digital media interactions, which might make the findings more or less clear. The ability to compare results from different research is compromised when there are differences in demographic control.
- Some studies, especially those using advanced neuroimaging methods, may have tiny sample numbers. It is possible to overestimate or underestimate the effects of reels on



## The Effect of Reels on Attention among Young and Middle-Aged Adults

attention if the samples are too small, which limits the generalizability of the results and reduces statistical power.

### *Considerations of Time*

- The majority of research on the consequences of reel consumption on cognition, attentional control, and cognitive load has concentrated on the short term. The long-term effects of reel exposure have not been thoroughly studied in longitudinal studies. Due to this omission, we do not know enough about the effects of long-term usage on young and middle-aged individuals.
- New platforms and formats appear on a daily basis, altering the digital media ecosystem, which is already in a constant state of flux. Researchers may have missed certain up-to-date trends and user habits in their studies done even only a few years back. Because of this time gap, results may not be applicable or relevant to the current situation.

### *Factors in Context*

- **Factors Influencing the Environment:** The way people watch reels, such as multitasking or watching in leisure time, might have a big impact on how their brain works. While these environmental elements may mitigate reel consumption's effects on focus and mental effort, they have been mostly ignored in research.
- People are unique, and that includes their attention spans, cognitive capacities, and levels of media literacy from the outset. Varying studies find varying effects of reels on attention since these individual characteristics aren't always accounted for.

### *Differences in Reel Content from a Technological and Content Perspective*

- Reels may have wildly different content in terms of complexity, engagement, and emotional effect. Although various forms of information may have distinct impacts on cognition and attention, researchers seldom distinguish between them. The effects of instructional reels, as opposed to those of entertainment-only reels, may vary.
- **Features Unique to Each Platform:** Instagram, TikTok, and Facebook are just a few of the sites where reels may be stored. Each platform has its own set of features and user interfaces. How users engage with reels and feel their cognitive consequences may be impacted by these platform-specific factors. These distinctions are often overlooked in studies, which might make it hard to compare results.

### *Neurobiological Assessment Constraints*

- Neuroimaging studies, however illuminating, have their limits imposed by the resolution and breadth of present-day technology. The intricate and ever-changing cognitive processing that goes on during reel consumption may be beyond the scope of functional magnetic resonance imaging (fMRI) and other methods that only provide snapshots of brain activity.
- Complexity in interpreting neurobiological data arises from the fact that associations between brain activity and cognitive processes do not always indicate a causal relationship. Due to this intricacy, judgments on the effects of movies on brain function might be oversimplified.

### *Publication and Reporting Bias*

- This refers to the tendency of researchers and journals to selectively publish studies that have significant or positive findings, while neglecting to publish studies with null

## **The Effect of Reels on Attention among Young and Middle-Aged Adults**

or negative results. Publication bias may distort the general understanding of how reels influence attention, perhaps exaggerating the effects reported in the research.

- **Insufficient Reporting:** Certain studies may fail to provide comprehensive methodological information, therefore impeding the evaluation of the results' quality and dependability. Insufficient reporting of participant characteristics, intervention details, and outcome measures might impede the synthesis of evidence.

### ***Scope of Research***

Although there are limits, there is much potential for future study to improve our understanding of the impact of reels on attention across various age demographics. This scope includes enhancements in methodology, larger representation of participants, and a wider range of contextual factors.

### ***Improvements in Methodology:***

- The consistent use of validated instruments will facilitate more precise comparisons and synthesis of findings across studies.
- A more thorough comprehension of the potential risks and benefits will be achieved by taking into account the long-term effects of protracted exposure on cognitive functions and attention.

### ***Broadened Participant Demographics***

- A broader spectrum of participants, including those from a variety of socioeconomic backgrounds, educational backgrounds, and cultural contexts, should be incorporated into future studies.
- In studies that involve neuroimaging, the generalizability of findings and the statistical power of the research will be improved by increasing the sample sizes.

### ***Broader Contextual Factors***

- The objective of research should be to as closely as possible replicate the behaviors of media consumption in the actual world. Research conducted in naturalistic environments will offer more precise insights into the cognitive effects and the manner in which individuals interact with reels.
- Subsequent studies should include the environmental and human contextual elements that impact media intake. This involves taking into account the presence of multitasking situations, the intended goal of consuming media (such as relaxation or education), and variations in individuals' inherent cognitive capabilities.

### ***Variability in Technology and Content***

- Future research needs to distinguish between various kinds of reel material and how each affects attention differently. More complex insights will come from knowing how instructive, entertaining, and other kinds of reels impact brain processes.
- Examining the ways in which distinct platform attributes affect reel consumption and cognitive impacts will provide a better understanding of the wider implications of digital media environments.

### ***Advances in Neurobiology***

- Future studies may make use of more detailed and high-resolution imaging techniques as neuroimaging technology develops to get a deeper understanding of the neurological consequences of reel consumption.

## The Effect of Reels on Attention among Young and Middle-Aged Adults

- Studies using longitudinal neuroimaging may provide light on the ways in which extended exposure to reels alters brain activity over time, advancing our knowledge of the underlying neurobiological processes.

### *Addressing Bias*

- To address bias, future research should make sure to include thorough reporting of methodological aspects, participant characteristics, and results. Improved transparency in reporting will bolster the dependability and replicability of research results.
- To mitigate publication bias, it is imperative to make a concerted effort to publish research that provides null or negative results. This will ensure a more comprehensive and unbiased understanding of the impact of reels on attention. This will aid in reducing the impact of publication bias and provide a more precise comprehension of the research environment.

## CONCLUSION

To summarize, existing data suggests that reels have an impact on the attention of both young and middle-aged adults. However, the specific magnitude and characteristics of these effects are determined by several aspects, including age, kind of material, and the environment in which they are consumed. The limitations highlighted in existing research emphasize the need for additional rigorous, systematic, and comprehensive investigations to get a complete understanding of the cognitive consequences of consuming short-form videos. Future studies may fill up these research gaps, leading to more precise recommendations for digital media use and enhancing our comprehension of its impact on attention in various age groups.

## REFERENCES

- (n.d.). International Journal of Science Engineering and Technology. [https://www.ijset.in/wp-content/uploads/IJSET\\_V11\\_issue4\\_500.pdf](https://www.ijset.in/wp-content/uploads/IJSET_V11_issue4_500.pdf).
- Asif, Mohd & Kazi, Saniya. (2024). Examining the Influence of Short Videos on Attention Span and its Relationship with Academic Performance. *International Journal of Science and Research (IJSR)*. 13. 8. 10.21275/SR24428105200.
- Bulut, D. (2023). The Association between Attention Impairments and the Internet and Social Media Usage among Adolescents and Young Adults with Potential Consequences: A Review of Literature. *Psychology*, 14, 1310-1321. <https://doi.org/10.4236/psych.2023.148073>.
- Cardoso-Leite P, Buchard A, Tissieres I, Mussack D, Bavelier D (2021) Media use, attention, mental health and academic performance among 8 to12 year old children. *PLoS ONE* 16(11): e0259163. <https://doi.org/10.1371/journal.pone.0259163>.
- Chen, Yuhan & Li, Mingming & Guo, Fu & Wang, Xue-shuang. (2022). The effect of short-form video addiction on users' attention. *Behaviour and Information Technology*. 10. 1080/0144929X.2022.2151512.
- Dai, X., Wang, J. Effect of online video infotainment on audience attention. *Humanit Soc Sci Commun* 10, 421 (2023). <https://doi.org/10.1057/s41599-023-01921-6>.
- Giraldo-Luque S, Aldana Afanador PN, Fernández-Rovira C. The Struggle for Human Attention: Between the Abuse of Social Media and Digital Wellbeing. *Healthcare*. 2020; 8(4):497. <https://doi.org/10.3390/healthcare8040497>.
- Giraldo-Luque S, Aldana Afanador PN, Fernández-Rovira C. The Struggle for Human Attention: Between the Abuse of Social Media and Digital Wellbeing. *Healthcare*. 2020; 8(4):497. <https://doi.org/10.3390/healthcare8040497>.

## The Effect of Reels on Attention among Young and Middle-Aged Adults

- Haxel, Carly A., "Technology Screens and Effects on Attention: A Meta-Analysis" (2022). Honors Undergraduate Theses. 1275. <https://stars.library.ucf.edu/honorstheses/1275>.
- Hong, S. (2022). The Instagram Reels Effect: How the viewing order and valence of emotions impact willingness-to-pay and perception of advertisements.
- Impact of Reel marketing on purchase intention. (n.d.). IIMB-. <https://repository.iimb.ac.in/handle/2074/21327>.
- Just a moment... (n.d.). <https://journals.physiology.org/doi/pdf/10.1152/advan.00109.2016>
- Kheya Sriram (2023) To What Extent Does Social Media Usage Impact the Ability to Delay Gratification and Attention Span of Teenagers in Mumbai? *British Journal of Multidisciplinary and Advanced Studies: Business and Management Sciences* 4(6),71-86
- Montagni I, Guichard E, Kurth T. Association of screen time with self-perceived attention problems and hyperactivity levels in French students: a cross-sectional study. *BMJ Open* 2016;6: e009089. doi:10.1136/bmjopen-2015-009089.
- Schubart, Constantin & Enström, Elin. (2021). The Attention Economy: Correlations between Media Multitasking and Decreasing Attention.
- Shodhganga@INFLIBNET: Effects of smartphone use on attention span of Screenagers a study on communication intervention. (n.d.). <https://shodhganga.inflibnet.ac.in:8443/jspui/handle/10603/431832>.
- Single view. (2020, January 6). *International Journal of Current Science Research and Review*. <https://ijcsrr.org/single-view/?id=12429&pid=11944>.
- Tripathi, Nitesh. (2021). Effects of Smartphones on Attention Span of Youth.
- Tripathi, P.M. (2023). A Comparative Study on the Attention Span of Male and Female Young Adult Viewers of Instagram Reels. *International Journal of Indian Psychology* , 11(2), 1132-1139. DIP:18.01.121.20231102, DOI:10.25215/1102.121.
- Why our attention spans are shrinking, with Gloria Mark, PhD. (n.d.). <https://www.apa.org/news/podcasts/speaking-of-psychology/attention-spans>.
- Zheng, C. Research on the flow experience and social influences of users of short online videos. A case study of DouYin. *Sci Rep* 13, 3312 (2023). <https://doi.org/10.1038/s41598-023-30525-y>.
- Ziyan Xu, Xinqiao Gao, Jun Wei, Huiqin Liu, Yu Zhang, Adolescent user behaviors on short video application, cognitive functioning and academic performance, *Computers & Education*. 203, Volume 2023, 104865 ISSN 0360-1315, <https://doi.org/10.1016/j.compedu.2023.104865>. <https://www.sciencedirect.com/science/article/pii/S0360131523001422>

### **Acknowledgment**

The author(s) appreciates all those who participated in the study and helped to facilitate the research process.

### **Conflict of Interest**

The author(s) declared no conflict of interest.

**How to cite this article:** Das, A. & Mishra, H. (2024). The Effect of Reels on Attention among Young and Middle-Aged Adults. *International Journal of Indian Psychology*, 12(3), 348-359. DIP:18.01.031.20241203, DOI:10.25215/1203.031