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Technology Addiction and Behavioural Changes: A Systematic Review

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Abstract

Technology is so much integrated in our every-day life that there are a concern of increasing dependency and the effect of the same on behaviour among various age groups. This systematic review is a synthesis of publications published in the past 2015-2025 to explore the cognitive, emotional, social, academic, and physical effects of technology addiction. The review is based on the PRISMA approach and incorporates the results of international research, institutional reports, and country survey findings. Findings show that technology addiction is more or less like behavioural addictions which are compulsive, cannot be controlled, and that they have withdrawal-like behaviour (Griffiths, 2005). Such cognitive effects as decreased attention span, multitasking exhaustion, and sleeping problems are associated with emotional and psychological problems like anxiety, irritability, loneliness, and depressive symptoms. Social effects include more withdrawal, loss of face-to-face communication and amplified risks of cyberbullying. Physical influences are patterns of sedentary lifestyle, disruption of circadian rhythms, and musculoskeletal loads. It is more specific to the age as children and adolescents are especially susceptible, and adults tend to become more dependent on productivity and their emotional state. The review has indicated the importance of multi-level interventions, addressing digital literacy programmes, parent guidance and public-health interventions, and additional longitudinal and culturally varied research. Technology addiction is a phenomenon that needs to be known and treated as digital technologies keep growing to achieve mental health, promote healthy development, and inform policy reactions.

1. Introduction

1.1 Background of the Study:

Over the last ten years, digital technologies have infused their way into the life of ordinary people to define the way people interact, learn, work, and entertain themselves. The popularisation of smartphones, social media sites, online video games and video streaming applications has changed social behaviour, particularly among the younger generation. Even though technology made accessibility and global connectivity more convenient, its ubiquitous nature has led to new trends of compulsive and excessive consumption that are akin to behavioural addictions. In the early 2000s, the research on Internet addiction proposed similarities to substance-related disorders, including cravings, lack of control, and withdrawal-like symptoms following a restricted access (Young, 2017). This grey area between practical use and addiction has drawn global attention, even when digital spaces get more realistic and customised.

These behavioural risks have been identified as a global issue when the World Health Organization (WHO) added the term Gaming Disorder to the International Classification of Diseases (ICD-11) with the following reference to impaired control, preference of gaming over other activities of life, and persistence regardless of adverse outcomes (WHO, 2019). Furthermore, Problematic Internet Use (PIU) has proven to be a valid concept in psychological research, and its studies have revealed they are associated with emotional inability, cognitive overload, and social withdrawal (Kuss and Lopez-Fernandez, 2016). Over the last several years, as digital ecosystems become more and more intertwined with algorithm-based engagement systems, users, particularly teenagers, become vulnerable to the cycle of immediate satisfaction, which also increases the likelihood of becoming addicted to technology. This is the metamorphosis of occasional, intentional application to compulsive and dependency-like patterns, which explains the acuity of methodical research studies.

1.2 Statement of the Problem:

Technology addiction has become a serious behavioural issue among children, adolescents, and adults, and researchers report the increase in the dependence on smartphones, gaming, and social media (Twenge et al., 2019). Overload with digital use is becoming more frequently related to anxiety, stress, sleeplessness, and poor emotional control (Elhai et al., 2017). Despite growing research on the overuse of technology, the available results are disjointed across various platforms, populations and behavioural measures, preventing in-depth observations. These differences in the measurement tools and conceptual inconsistencies also contribute to the lack of comparability between studies (Panova and Lleras, 2016). Thus, the systematic review is needed to combine scattered evidence, recognise recurring patterns of behaviour, and assess the general psychosocial impact of technology addiction.

1.3 Significance of the Study:

Technology addiction and behavioural outcomes need a systematic review by various stakeholders; educators, parents, mental-health professionals, and policymakers. To the teachers, knowledge of the behavioural and cognitive consequences of too much screen-time can inform the development of moderate digital pedagogies and classroom-management strategies. Evidence-based considerations on the effects of excessive use of technology on emotional stability, family relations, and developmental trajectories of children can be useful to the parents. Psychologists and counsellors need to have consolidated knowledge to create intervention models, screening tools, and treatment protocols that are based on the empirical evidence.

On a larger scale, by synthesising studies in different socio-cultural dimensions, one can detect the general overarching trends of global behaviour, including shorter attention span, withdrawal, irritability and lower academic performance which have been identified in the

various studies (Chung et al., 2019). This finding can inform policy-makers to contextualise digital-wellness principles, awareness and youth mental-health programmes. A systemic synthesis is also useful to academic scholarship, and it brings conceptual clarity and enhances the theoretical bases of digital behaviour and new behavioural addictions. This work would help provide a clearer picture of the behavioural effects of technology addiction in modern societies as it is integrated with the dispersal body of knowledge.

2. Research Objectives:

i. To systematically review existing literature on technology addiction and identify key behavioural changes across different age groups.
ii. To examine the psychological, social, and academic implications of having too much technology.
iii. To synthesise evidence-based recommendations for mitigating technology addiction and promoting healthy technology use.

3. Research Methodology:

The research paper follows a systematic review design and PRISMA requirements with the aid of a qualitative synthesis to unify the results of the research on technology addiction and behavioural outcomes. Peer-reviewed journals in Scopus, Web of Science, PubMed, and Google Scholar and institutional publications by WHO, APA, UNICEF, UNESCO, and other books, dissertations, and national surveys, including NFHS, NCERT, and Pew Research, have been identified as the source of secondary data. Studies containing a definition or measurement of technology addiction, Internet addiction, or digital dependency and studies that investigate behavioural or psychosocial effects were included in the review and were published between 2015 and 2025. Only the publications using English language were taken into account. The exclusion criteria included clinical trials, neurological imaging, pharmacological intervention or non-scholarly literature like blogs or news articles. To extract data, the behavioural outcomes (cognitive, emotional, social, academic, and physical) were coded and recurrent themes in studies identified to create an accumulated grasp of the alterations in technology-related behaviour.

4. Findings of the Systematic Review:

The body of research on technology addiction, which includes Internet addiction, smartphone addiction, gaming disorder, and social-media dependency, shows that there is a similar trend of behavioural, psychological, social, and physical outcomes, throughout all age groups. The reports that were released after 2015 up to 2025 point out that over-use of digital may affect the cognitive processing, emotional control, social interactions, and general lifestyle patterns in a significant way. The thematic synthesis below offers synthesized results of substantial empirical studies.

4.1 Behavioural Changes Associated with Technology Addiction:

4.1.1 Cognitive and Academic Behaviour:

The large amount of literature demonstrates that technology addiction has significant cognitive impairments, especially in attention, memory, and executive functioning. Research shows that overuse of smartphones and the Internet is linked to lack of cognitive control and sustained attention deficit (Wilmer, Sherman, and Chein, 2017). Teenagers that often have to multitask over the digital landscape tend to exhibit cognitive overload which reduces their working-memory capacity and their ability to concentrate on academic activities. The study of Uncapher et al. (2016) can prove that, in comparison to low multitaskers, the heavy media multitaskers perform worse in attention-regulation tasks, which indicate the long-term cognitive load of continually switching between digital behaviours.

Under the uncontrolled digital exposure, academic performance is also found to be diminishing. Junco (2015) discovered that students who devoted more time on social networking platforms had less study time and lower academic performance with procrastination coming out as an intervening variable. Constant alerts and disruptions on social-media distract deep learning processes, and hence reduce retention and comprehension (Rosen, Lim, Carrier, and Cheever, 2014). Sleep deprivation also contributes to worsening of cognitive functions, as night-time device usage was demonstrated to harm attention the next day and disturb academic operation (Hale and Guan, 2015). All these results suggest that technology addiction has a cumulative impact on academic productivity, as it affects attention, learning retention, sleep quality and task persistence.

4.1.2 Emotional and Psychological Behaviour:

The phenomenon of technology addiction has a close relationship with the increased level of emotional and psychological instability. It has been found that compulsive digital behaviours are linked to increased anxiety, irritability, and agitation, particularly in people unable to use their devices, which are symptoms of behavioural withdrawal (Elhai, Levine, Dvorak, and Hall, 2017). Separation with smartphones has been associated with an elevated physiological arousal and low cognitive functioning, which implies an emotional dependence on digital devices (Hartanto and Yang, 2016).

Fluctuation of mood is also common. Research indicates that reward-seeking loops that are evoked by notifications, likes, and gaming rewards activate dopamine pathways, which supports checking behaviours repeatedly (Montag and Reuter, 2017). Should these reinforcement cues be removed, the users feel frustrated and emotionally volatile. Moreover, social-media addiction has also been linked to the development of higher-levels of loneliness and depressive symptoms according to the social comparison and fear of missing out (FOMO) (Steers, Wickham, and Acitelli, 2014). A meta-analysis study by Marino et al. (2018) has verified that there is a strong correlation between problematic use of Facebook and depressive tendencies, and emotional distress can be a cause and an effect of addictive online behaviour.

4.1.3 Social Behaviour:

One of the common themes in the literature is the loss of the physical interaction with social life under the pretext of too much digital interaction. The use of smartphones has been associated with problematic use and social isolation as well as choice of online interaction over offline relationships (Bian and Leung, 2015). Teenagers who are addicted to playing online games tend to substitute physical interaction with online interaction thus lack of interpersonal skills and social competence. Research by Odaci and Kalkan (2010) reveals that heavy Internet users have elevated degrees of social anxiety and avoidance behaviours, which are the changing dynamics of social interaction in cyberspace.

Also, with the dependence on technology, family relationships are strained as well. Screen time takes the place of parent-child communication, family time, and strengthens family discord (Coyne et al., 2017). Youngsters and teens that devote extended hours to the use of digital gadgets are prone to develop communication problems and lack effectiveness, which further influence domestic life. The other vital discovery is associated with the involvement of cyberbullying. According to the review conducted by Kowalski, Giumetti, Schroeder, and Lattanner (2014), the victims, as well as the perpetrators of the cyberbullying, tend to be more Internet addicts, which indicates a bidirectional relationship between online immersion and detrimental social behavioural patterns. Comprehensively, the literature indicates that technology addiction is transforming the social behaviour by disrupting the real world communication, promoting avoidance tendencies, creating more tension in the family, and providing chances of cyber-aggression.

4.1.4 Physical Behaviour:

The health impact of technology addiction is well-researched in current health studies. Too much use of digital devices encourages sedentary lifestyles, which have been associated with weight gain, poor physical fitness, and health risks that are dangerous in the long run (Ding et al., 2016). Long-term screen time is also a cause of eye tension, headaches, blurred vision, or what is collectively called digital eye strain (Rosenfield, 2016). Another significant physical effect is sleeping disruption, as exposure to blue light through screens inhibiting melatonin synthesis and disrupting circadian rhythm results in delayed onset of sleep and worse sleep quality (Chang, Aeschbach, Duffy, and Czeisler, 2015).

Cases of poor posture and musculoskeletal discomfort are common in heavy device users. Chronic neck pain and spinal strain have been found to be caused by the sustained flexion of the neck as a result of smartphone use (sometimes referred to as text neck) (Neupane, Ali, and Mathew, 2017). These results suggest that technology addiction is not only a psychological or behavioural problem, but a multisystem health issue that influences physiological health by causing sleep disturbance, inactivity, postural tensions, and discomfort caused by the screen.

4.2 Age-Specific Findings:

4.2.1 Children:

Technology addiction is linked to developmental and behavioural problems among the children. Studies indicate that screen exposure at a young age and too often results in slowed social-skills development, lower levels of emotional comprehension, and poorer verbal communication (Madigan et al., 2019). Those children spending much time on digital play activities are more likely to be deprived of unstructured, imaginative, or peer-driven activities, which are essential to socio-emotional development.

Outbursts of behaviour and hyperactivity are also noted among addicts of digital devices. Nikkelen, Valkenburg, Huizinga, and Bushman (2014) discovered that media multitasking and rapid digital content can excessively arouse young children, which leads to attention issues and impulsive behaviours. Furthermore, it has been reported that violent or competitive video games are linked to high levels of aggression among children and a number of studies reported that aggressive thoughts and behaviours become more intense with a high exposure to these games (Anderson et al., 2010). These results indicate the exposing nature of young children to the developmental and behavioural effects of technology addiction.

4.2.2 Adolescents:

Adolescents are the group that is the most prone to technology addiction. They are in their developmental stage, want to be liked by the peers, and highly sensitive emotionally which provides the conditions of the compulsive use of digital devices. The studies show that young people tend to get addicted to smartphone or social-media use more than adults because digital platforms play a central role in peer communication among young people (Twenge et al., 2019). The increased use of social-media leads to self-comparison, which is a cause of body-image issues, lessened self-esteem, and increased symptoms of depression (Fardouly, Diedrichs, Vartanian, and Halliwell, 2015).

The close relatedness of the problem of adolescent technology addiction also implies academic and emotional unsteadiness. Social-media use or heavy gaming is associated with poor academic performance, impulsivity, and poor emotional regulation (Li, Garland, and Howard, 2014). It was also found that teenagers affected by digital dependence tend to experience higher levels of stress and mood fluctuations caused by online peer pressure, cyberbullying, and FOMO (Oberst, Wegmann, Stodt, Brand, and Chamarro, 2017). By and large, studies point out that adolescence is a critical stage in which the addiction to technology may severely interfere with the development of academic, emotional, and psychosocial aspects.

4.2.3 Adults:

As much as adolescents are the most common target of studies, technology addiction is also a major factor that affects adults. Digital distraction in workplaces due to continuous notifications, Social-Media surfing, and multitasking lowers work productivity and results into cognitive exhaustion (Mark, Gudith, and Klocke, 2008). The more adults depend on technology to regulate their emotions, i. e. use digital devices to cope with stress or loneliness, the higher the probability of developing problematic patterns of usage (Elhai et al., 2017).

Gambling and gaming addiction amongst adults online is another emerging field of concern. According to Gainsbury et al. (2015), mobile gambling applications have become more accessible and anonymous, which increases the risk of addiction, whereas the Internet gaming disorder is increasingly being reported in the young adult groups. Such results demonstrate that the addiction to technology is not limited to adults to entertainments, but also to productivity, emotional and financial risk behaviours.

4.3 Socio-Cultural Factors:

Technology addiction is a major factor that is influenced by socio-cultural dynamics. The parenting style especially plays a significant role; the style has been shown to be higher with permissive or uninvolved parenting among adolescents, with respect to problematic Internet use (Lee, 2012). Authoritative parenting and digital monitoring practices on the other hand will mitigate the chances of addictive behaviours. A peer effect is also a factor because teenagers tend to use digital behaviors that are deemed acceptable by the peer groups.

Cities with a high level of Internet coverage and a lack of physical areas to play in also promote the use of digital leisure (Kuss, Griffiths, Karila, and Billieux, 2014). Gender disparities are always disclosed: boys are more inclined to display the rates of gaming addiction, and girls to disclose the dependence on the social-media platforms (Andreassen et al., 2017). The normalisation of constant connectivity and digital interaction by different cultures makes it easier to use things excessively and harder to tell the difference between healthy and problematic behaviour. All these socio-cultural variables together indicate that technology addiction is not only determined by personal weaknesses but also environmental factors in general.

4.4 Overall Synthesis:

In both studies in the world and in India, there is a great deal of agreement that the addiction to technology is increasing and that it yields multiple behavioural, emotional, social and physical effects. The analyzed literature demonstrates interrelated impacts: emotional problems worsen thinking abilities, which consequently deteriorate academic or work results, social disengagement increases loneliness, and digital addiction is reinforced. These circles of feedback demonstrate the multifaceted, multi-layered character of technology addiction.

In addition, the fact that the results were similar and consistent among the age groups, including those of children, adolescents, and adults, confirms that there is no particular demographic to which technology addiction is limited. Rather, it is a ubiquitous behavioural issue that needs multi-level responses, such as digital literacy interventions, parental education, school-based counselling, and awareness strategies at the policy level. This combination highlights the necessity of comprehensive measures that can be taken to focus on the psychological, social, and structural factors involved in digital dependency.

5. Discussion:

5.1 Interpretation of Findings:

The results of this systematic review prove the assumption that technology addiction reflects the most significant features of behavioural addictions, such as compulsive behavior, loss of control, withdrawal symptoms, and persistence

despite harmful effects. These characteristics are in line with the Components Model of Addiction introduced by Griffiths (2005) that displays salience, mood modification, tolerance, withdrawal, conflict, and relapse as core aspects in all behavioural dependencies. The analysis of problematic Internet and smartphone use has always shown such trends, implying that digital technologies have the ability to provoke addictive behavior (like gambling or gaming) (Kuss and Lopez-Fernandez, 2016).

It is also shown in the review that behavioural changes that occur due to technology addiction have a simultaneous impact on academic, emotional, and social functioning. Emotional instability, anxiety, and irritability were often supported by cognitive impairments (reduced attention and poor memory retention and disrupted sleep, especially in adolescents) (Wilmer et al., 2017; Elhai et al., 2017). These behavioural imbalances, in their turn, affected academic and occupational achievements, which strengthens the interdependence of technology addiction. The withdrawal symptoms of social interaction, the avoidance of meeting a person, and relying on virtual communication are also the multidimensional indicators of the prevalence of excessive use of technology (Bian and Leung, 2015).

One interesting conclusion that has been brought about by the review is that consistency between nations is a sign that there are universal behavioural patterns, irrespective of cultural or socioeconomic distinctions. To illustrate, the studies in the United States, Europe, and Asia demonstrate similar results: shorter attention, anxiety, and loneliness are the characteristics of problematic digital consumption (Twenge et al., 2019; Montag and Reuter, 2017). The cross-cultural similarity is an indicator that the psychological processes of technology dependency can originate in the existence of human cognitive processes, which are universal and especially in reward-seeking, social comparison, and emotional regulation tendencies. Therefore, one can see technology addiction as an international behavioural health problem that needs to be fully addressed.

5.2 Implications for Education:

The results highlight the importance of digital literacy programmes in schools. Since the research revealed that high implementation of technology has harmful consequences on concentration, academic achievements, and sleep quality (Rosen et al., 2014; Hale and Guan, 2015), schools should actively instruct students on moderate and responsible use of technology. Online safety, screen-time, and psychological consequences of excessive use of the Internet can be taught using digital literacy curricula.

Also, the review recommends the significance of balanced integration of technology in classroom. Although digital tools are beneficial in opening access to information, overuse might unintentionally promote multitasking and distraction. The results presented by Junco (2015) regarding the low academic performance caused by the social-media multitasking point at the importance of the controlled, pedagogically valid use of technology instead of unlimited access to devices. Teachers need to integrate online resources in cases where they assist in learning and do not involve changing platforms frequently.

Also, it is essential to monitor the time that students spend at the screen. Schools have the ability to work hand in hand with parents who can monitor the digital habits and eliminate the problem behaviours at a tender age. There are facts that reveal that early intervention causes considerable lessening of long-term addiction possibilities (Young, 2017). Therefore, the learning institutions should embrace prevention measures instead of reaction mechanisms.

5.3 Implications for Parents:

In the process of the development of digital trends in children, parents are at the centre stage, and the

review highlights the need to model healthy technology behaviours. Research indicates that children whose parents spend a lot of time on digital gadgets when communicating with them have lower emotional interest and might replicate compulsive digital behaviours (Coyne et al., 2017). Parental modelling is thus a strong prediction of technology-related behavioural outcomes.

Boundaries should also be set and screen free zones created. It has been found that effective supervision of the Internet and systematic regulation minimize the chances of having problematic Internet use among adolescents (Lee, 2012). Strategies that can be used by families include no-device meal times, family recreational time and a well-defined system on playing an online game or using social-media.

Moreover, awareness and self-control can be promoted through parent-child communication regarding the risks of spending too much time on screens. It has already been proven that adolescents who are aware of such implications exhibit superior judgement in digital choices, and fewer addictive behaviours (Oberst et al., 2017). Parents, therefore, play an important role in the prevention and reduction of technology addiction.

5.4 Health Implications on the Population:

Review recommends that technology addiction should also be considered as a developing mental health issue. As digital dependency is increasingly being viewed as a public-health concern and treated as a structured intervention with the WHO including Gaming Disorder in the ICD-11 (WHO, 2019), the concept of digital dependency gains recognition. Multidisciplinary studies have identified the psychological, physical and social effects that should be addressed by the public-health structures.

Among the implications, the necessity to implement policies on the level of strategies such as mass awareness campaigns that will inform people on the early symptoms of addiction can be mentioned. Health agencies can spread the rules about the suggested screen time of children and adolescents and draw attention to the dangers of uncontrolled online communication. Setting up counselling schools or online wellness clinics in schools, universities and community health systems would also be useful in early detection and treatment of cases.

Additionally, the physical health impacts of sedentary behaviour, musculoskeletal stress, and sleep disturbance should be taken into consideration by the public-health systems as the components of the holistic intervention strategies (Rosenfield, 2016; Neupane et al., 2017). The technology-health nexus cannot be resolved using only a single discipline (technology or health), which will be critical in the long-term welfare of society.

5.5 Gaps in Existing Literature:

Although there is extensive research, there are still a number of gaps. To begin with, longitudinal studies are also weak, and it is hard to comprehend the long-term developmental and psychosocial effects of technology addiction. In the majority of studies available, the data used is cross-sectional, and it is not possible to conclude on causality (Kuss et al., 2014). Second, studies heavily target digitally connected and urban populations, which is a disproportion, when rural and low-income communities are the least represented in studies, which is particularly relevant considering the fast increase in mobile technology usage in remote areas. Thirdly, emerging technologies, including AI chatbots, virtual reality, and immersive gaming, have not been studied empirically. These novel platforms might pose some special dangers of addiction, but there is limited empirical data on the behavioural effects of these platforms. The research to close these gaps will have to be interdisciplinary, cultural-diverse and methodologically rigorous.

6. Recommendations:

The results presented in the study suggest that the increased behavioural effects of technology

addiction need to be dealt with by combined efforts of educational institutions, families, policy systems, and research communities. The recommendations below seek to encourage healthier digital activity, as well as to inform future interventions.

6.1 For Educators:

i. Introduce awareness programmes in classrooms that will inform students about the cognitive, emotional and social harm of overusing digital devices. These programmes need to incorporate the safe online behaviour, responsible use of screens and the awareness of the early symptoms of digital addiction.
ii. Encourage non-digital learning through the use of reading, group discussions, art, sports, and tasks that do not require screens and holistic learning.
iii. Indeed, create formal school policies on the use of digital devices, so that technology use is not introduced to schools until it can add to the learning process without prompting students to do other tasks and get distracted.

6.2 For Parents:

i. Arranged, automated digital practices that control time on a computer daily, such as game, social-media, and entertainment regulations. Routine frequency assists the children and adolescents to acquire self-regulation.
ii. Promote interests, activities and play outside encouraging alternatives to online activity. Exercises lower the level of sedentary behaviour and aid in emotional support.
iii. Set good examples of healthy digital habits, including an example of balanced device use, shared family activities, and screen-free zones like dining areas and bedrooms.

6.3 For Policymakers:

i. Establish national standards of age-related screen-time regulations that are consistent with the regulations of other countries to direct parents, schools, and institutions.
ii. Sensitize school and community on the mental, social, and physical effects of overuse of technology through digital-wellness campaigns.
iii. Encourage the development of online wellness and counselling centres especially in schools and within the public health.

6.4 For Researchers:

i. Carry out dualistic research trying to understand the emotional and psychosocial impacts of technology addiction among different age groups and cultures.
ii. Increase the research on the latest technologies, such as AI tools, virtual reality, and immersive gaming, to get an idea of their role in addictive behaviours.
iii. Give longitudinal research designs a priority to address long-term developmental and behavioural consequences which do not feature in cross-sectional research.

7. Conclusion:

The current systematic review discussed behavioural, emotional, social, academic and physical consequences of technology addiction of various age groups based on empirical data of world investigations. The results show that technology dependency exists in a manner that is similar to established behavioural addictions, which show compulsive, loss of control, and withdrawal tendencies (Griffiths, 2005). Its effects are multidimensional as it affects cognitive processes, psychological health, academic/ workplace and also interpersonal relations. The fact that these effects are constant in cultural settings indicates that technology addiction is a widespread international issue that is influenced by universal human reward-seeking and social approval tendencies (Montag and Reuter, 2017). Children and adolescents became the most vulnerable groups, and it will have serious socio-emotional and learning consequences, as well as the formation of the identity. Overconsumption of screen time was revealed to be associated with the drop in attention span, sleeping disorders, anxiety, and social withdrawal (Elhai et al., 2017; Wilmer

et al., 2017). Even adults are not exempted as they also experience harm especially in the way they work in the workplace and manage their emotions, which means that there is no age limit to technology addiction. Physical implications Caused by musculoskeletal stress, sedentary lifestyle, disturbed circadian rhythms, etc., physical effects indicate that the problem is not confined to mental health issues, but that it presents broader public-health concerns.

The paper also notes that the concerted efforts in the education, family, and policy systems are imperative. Digital literacy programmes, role modelling on the part of parents, balanced classroom technology applications and national guidelines on screen time are key preventive measures. The growth of research in the rural population, in developing technologies like AI and virtual reality, and long-term behavioural outcomes, which are included in the long-term outcomes at present, are also pivotal, and the existing literature is currently somewhat small. Conclusively, technology addiction is a fast-changing behavioural issue that has extensive consequences on the lives of individuals, families and societies. It must be tackled in a multi-level, multi-pronged strategy including evidence-based educational activities, positive parenting, community-health measures, and intensive scientific research. With the ever-increasing influence of digital technologies on everyday life, it is highly important to encourage responsible and moderate use to protect mental health, promote healthy development, and achieve the overall well-being of society. The results of the reviewed studies support the need to conduct long-term research, make informed decisions, and engage actively in the community to reduce the increasing threats of digital dependency in the contemporary world.

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