

Overcoming Gadget Addiction Among Rural Adolescents through Traditional Games: A Case Study in Langkat Regency, North Sumatra

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Abstract:

This study examines solutions to address gadget addiction among children and adolescents in rural areas through traditional games characteristic of North Sumatra Province, such as *Rimau Langkat*, kite flying, stick fighting, and marbles. The research was conducted in Perlis Village, Berandan Barat District, Langkat Regency, North Sumatra Province. The research method used is qualitative, through participatory observation, interviews, and documentation study. The findings show that children and adolescents in the village have begun to be affected by gadget addiction, although not all of them are influenced by gadgets. The study in Perlis Village shows that they successfully overcame gadget addiction through traditional games, which managed to divert their attention from excessive gadget use. Traditional games like *Rimau Langkat*, kite flying, stick fighting, and marbles not only succeeded in reducing gadget dependence but also improved physical skills, social interaction, and a sense of togetherness among children. The phenomenon of gadget addiction, which initially led to decreased participation in social activities such as communal prayers and religious studies, now shows a positive change as children begin to interact directly and engage more actively in outdoor activities. This study refutes the argument that children and adolescents today are difficult to separate from gadgets, as they are considered part of their development and culture. This study concludes that children and adolescents can still be saved from the dangers of gadget addiction and that the local wisdom of rural communities can address the negative impacts of modernity, even though they do not reject it.

Keywords: gadget addiction, traditional games, rural modernization, rural adolescents, local wisdom.

Abstrak:

Tulisan ini mengkaji solusi untuk mengatasi kecanduan gawai pada anak-anak dan remaja di wilayah perdesaan melalui kegiatan permainan tradisional khas Provinsi Sumatera Utara, yaitu *Rimau Langkat*, permainan layang-layang, tongkat stik, dan main guli. Kajian ini dilakukan di Desa Perlis, Kecamatan Berandan Barat, Kabupaten Langkat, Provinsi Sumatera Utara. Metode penelitian yang digunakan adalah kualitatif, melalui observasi berperan serta, wawancara, dan studi dokumentasi. Hasil penelitian menunjukkan bahwa kecanduan gawai pada anak-anak dan remaja telah mulai menjangkiti masyarakat desa, namun tidak semua anak dan remaja terpengaruh oleh gawai. Kajian di Perlis Village menunjukkan bahwa mereka berhasil mengatasi kecanduan gawai melalui permainan tradisional, yang mampu mengalihkan perhatian mereka dari penggunaan gawai yang berlebihan. Permainan tradisional seperti *Rimau Langkat*, layang-layang, tongkat stik, dan main guli tidak hanya berhasil mengurangi ketergantungan pada gawai, tetapi juga meningkatkan keterampilan fisik, interaksi sosial, dan rasa kebersamaan di kalangan anak-anak. Fenomena kecanduan gawai yang awalnya mengarah pada penurunan

partisipasi dalam kegiatan sosial, seperti salat berjamaah dan pengajian, kini mulai menunjukkan perubahan positif, di mana anak-anak kembali berinteraksi secara langsung dan lebih aktif dalam kegiatan luar ruangan. Hasil penelitian ini membantah argumen yang menyatakan bahwa anak-anak dan remaja sulit dipisahkan dari gawai, yang dianggap bagian dari perkembangan dan budaya mereka. Melalui penelitian ini, dapat disimpulkan bahwa anak-anak dan remaja masih dapat diselamatkan dari bahaya kecanduan gawai, dan bahwa kearifan lokal masyarakat perdesaan dapat mengatasi dampak negatif modernitas, meskipun mereka tidak menolaknya.

Kata kunci: kecanduan gawai, permainan tradisional, modernisasi perdesaan, remaja perdesaan, kearifan lokal.

INTRODUCTION

The development of digital technology has had a significant impact on society, including among children and adolescents in rural areas (Gainous et al., 2013). Gadgets or digital devices have now become an inseparable part of their daily activities (Widodo, 2020). The phenomenon of gadget addiction has become a serious concern in many regions. Children and adolescents who were previously active in social activities and outdoor play now spend more time in front of gadget screens (Zain et al., 2022). This gadget addiction has had a significant impact on their social and psychological development, such as reduced ability to interact directly, weakened participation in physical activities, and decreased involvement in social activities that were once characteristic of village life (Aldimasi et al., 2018). This situation not only affects their mental and physical health but also threatens the sustainability of local values and cultural traditions passed down through generations (Ali et al., 2020).

This condition aligns with a survey conducted by Dr. Kristiana Siste and her team from May to July 2020. The survey involved thousands of young people from 34 provinces in Indonesia and showed that 19.3% of teenagers in Indonesia experienced internet addiction, while 14.4% of young adults also showed signs of the same condition. The survey recorded that 2,933 teenagers experienced an increase in online duration from an average of 7.27 hours to 11.6 hours per day during the pandemic, an increase of 59.7%. The most common activities during this online time included playing online games, particularly Multiplayer Online Battle Arena (MOBA) games, as well as using social media. Before the pandemic, a survey in 2019 involving 643 teenagers in Jakarta also revealed that 31.4% of them had experienced internet addiction (CNN Indonesia, 2021).

Data from Data AI confirms that Indonesia ranks fifth in the world in terms of the number of app downloads, with a total of 7.56 billion downloads in 2023. Although Indonesia does not rank at the top in mobile app usage, Indonesians spent around 415 billion hours using mobile apps during that year (CNBC Indonesia, 2024). This condition shows the extent of society's dependence, including children and adolescents, on digital technology and mobile applications, thus increasing the risk of gadget addiction.

The phenomenon of gadget addiction in Indonesia also extends to North Sumatra. According to data from the Indonesian Internet Service Providers Association (APJII) in 2020, North Sumatra ranked first in the number of internet users in Sumatra Island (APJII, 2022). Fathya et al. (2020) support this condition by finding that 48.6% of the study subjects in Banda Aceh had a high level of smartphone addiction. Meanwhile, in Padang, the addiction rate among teenagers reached 43% for the high category and 50% for the moderate category (Sari et al., 2017). In Medan, the proportion of smartphone addiction among males reached 76.1% and 75.1% for females (Julyanti & Aisyah, 2023). This data shows that gadget addiction is not only occurring in large cities like Jakarta but is also spreading across the entire country.

The area of Perlis Village, Berandan Barat District, Langkat Regency, North Sumatra, has also been affected by gadget addiction among teenagers. Although located in a rural area approximately 66.3 km from the city of Medan (Hariani, 2022), gadget ownership is almost universal among children and adolescents in this village. Based on preliminary surveys conducted by the researcher in January 2024, five children were found to be consuming gadgets for an average of eight hours per day. This exceeds the five-hour limit for gadget use, which is considered an indicator of addiction. This also indicates that in Perlis Village, gadget addiction has affected children and adolescents. They prefer playing on their gadgets rather than engaging in outdoor activities in their surroundings.

This overall condition shows that the majority of children and adolescents are more interested in digital games than traditional games, which should be a healthy recreational medium and social learning tool. Traditional games not only serve as entertainment but also have high educational value, such as building teamwork, physical endurance, and social skills (Suhana, 2017). Ignoring traditional games means allowing this rich local potential to be eroded by the tide of modernity. Therefore, it is important to find concrete solutions to overcome gadget addiction among children and adolescents in rural areas while still respecting local culture.

Several previous studies have focused on ways to address gadget addiction in teenagers through psychological, educational, or technology-based interventions, but few have discussed solutions to gadget

addiction by utilizing local wisdom. For example, Hasibuan et al. (2024) in their research suggest an educational approach based on religion to tackle gadget addiction, emphasizing the role of parents and religious leaders in educating children to maintain a balance between technology and social life. On the other hand, Ardiyani et al. (2021) emphasize the importance of educating parents about the negative effects of gadgets and ways to address children's technology dependency through a more directed family approach.

Additionally, Potas et al. (2022) analyzed the influence of attitudes on technology addiction behaviors in adolescents, particularly during the COVID-19 pandemic, and suggested the importance of changing attitudes and a deeper understanding of the excessive use of gadgets. Agbaria (2023) also researched cognitive behavioral intervention in addressing internet addiction among adolescents, providing psychotherapeutic intervention as one approach to solving gadget addiction. Other research, such as that conducted by Aziz et al. (2021), focuses on the physical health impacts of game addiction on adolescents yet places more emphasis on technology as an educational tool to address the addiction.

This study fills a gap in the existing literature by focusing on utilizing traditional games as a culture-based solution to overcome gadget addiction. Unlike previous studies that focus more on psychological or technology-based interventions, this study demonstrates that traditional games, which are part of the cultural heritage of rural communities, have a great potential to divert children's attention from gadgets while improving their social and physical interactions. Thus, this study introduces a new approach that combines modern technology with local wisdom to address gadget addiction issues among rural adolescents, an approach that previous research has not extensively explored.

This study aims to explore the role of traditional games in overcoming gadget addiction among children and adolescents in Perlis Village, Berandan Barat District, Langkat Regency, North Sumatra. This study also seeks to examine how traditional games such as *Rimau Langkat*, kite flying, stick fighting, and marbles can serve as a healthy and enjoyable alternative activity while helping restore social interactions that have been disrupted due to gadget dependency.

Traditionally, traditional games have often been considered outdated and irrelevant to the needs of the digital generation. However, the study in Perlis Village proves that traditional games can still be an effective solution to prevent gadget addiction in children and adolescents. Games like *Rimau Langkat* and marbles not only attract their interest but also help rebuild social bonds and enhance both physical and mental skills. This success shows that local traditions have great potential in facing the challenges of modernity, including gadget addiction, without having to reject technological advancements completely.

METHOD

This study conducted research in Perlis Village, Berandan Barat District, Langkat Regency, North Sumatra. Researchers selected the location based on initial survey results showing the high intensity of gadget usage among children and adolescents in the village (Hariani, 2022). In the preliminary survey conducted in January 2024, five children were found to be using gadgets for an average of over eight hours per day, indicating signs of addiction. Therefore, the researchers directed the focus of the study toward observing how traditional games in the village are used as a strategy to divert children's attention away from gadgets.

Table 1. Sample of Children Experiencing Gadget Addiction

Informant	Age	Gadget Usage Duration	Gadget Activities
DR	11	8-10 hours	Playing online games, social media (Instagram, TikTok), and video streaming
BQ	10	13-15 hours	Watching YouTube, scrolling TikTok, chatting on WhatsApp and Line
HL	14	10-12 hours	Chatting on WhatsApp, scrolling social media (Instagram, TikTok)
AN	12	11-13 hours	Playing games, watching educational & entertainment content
FS	13	9-11 hours	Accessing social media, playing games, watching videos

Source: Research Findings, 2024.

This study is qualitative, consisting of primary and secondary data (Lune & Berg, 2017; Rahim & Dilawati, 2022; Sugiyono, 2020). The researchers obtained primary data through participatory observation and in-depth interviews with various informants, including children and adolescents addicted to gadgets, parents, village government officials, and village health counselors. They gathered secondary data from documentation and relevant reports related to gadget addiction levels in North Sumatra Province.

The study began with an initial survey in January 2024 to ensure the presence of children and adolescents experiencing gadget addiction. After identifying five children as the main sample, the researcher conducted participatory observation by following their daily activities, particularly as they began transitioning from gadget use to traditional games. This observation aimed to observe behavioral changes during the research period directly. Additionally, interviews were conducted with parents to understand their views on gadget addiction, with village government officials to learn about the measures taken, and with health counselors to gain insight into the health impacts of gadget addiction.

The data in this study were analyzed using Miles and Huberman's (2013) interactive analysis method, which includes data reduction, data presentation, and conclusion drawing. In the data reduction stage, the researcher focused on relevant information, particularly the experiences of five children who transitioned from gadget addiction to traditional games, discarding unrelated data to streamline the analysis. The reduced data were then presented in descriptive narratives and tables to clarify gadget usage intensity, types of activities, and behavioral changes. In the conclusion drawing stage, the researcher constructed final interpretations, observing how reduced gadget usage and increased participation in traditional games indicated the potential of these games as a solution to gadget addiction in children and adolescents in Perlis Village.

RESULTS AND DISCUSSION

Gadget Addiction Among Adolescents in Perlis Village

Perlis Village, located in Berandan Barat District, Langkat Regency, is a fishing village rich in natural resources, with the majority of its population working as fishermen. The Babalan River flows near the village, creating a unique environment with stilt houses, many of which stand on water. An oil refinery, once managed by BPM (*Bataafsche Petroleum Maatschappij*) and later by Pertamina, supports the area, making it one of the regions with a long industrial history (Hariani, 2022). In 2020, the population of Perlis Village reached 3,894 people with 996 families, reflecting a fairly large population dynamic. Although the majority of the residents in Perlis Village work as fishermen, they are also involved in agriculture and animal husbandry, predominantly practiced by settlers from the Javanese and Chinese ethnicities (BPS Kabupaten Langkat, 2023). Socially and culturally, the community of Perlis Village is deeply rooted in values of cooperation and deliberation, reflected in their daily lives, including in addressing economic problems often faced by fishing families.

However, despite being a coastal village traditionally associated with fishing activities, technological advancements have brought significant changes to the lifestyle of the local youth. Although life in this village is relatively simple, with many semi-permanent homes, the use of gadgets among adolescents in Perlis Village has become commonplace. Technology has turned gadget use, which was once limited to digital entertainment, into an inseparable part of their lives, even though they live in a fishing village far from the hustle and bustle of the city. This shift shows a social and cultural change influenced by technological development despite their geographical location in a more traditional environment. The increasing prevalence of gadgets in the lives of the youth in this village shows how they are becoming more connected to the digital world despite their limited living conditions.

This study reveals that gadget addiction has become a significant issue among children and adolescents in Perlis Village, with gadget usage duration exceeding the acceptable limit. Based on a survey conducted in January 2024, five children and adolescents in this village spend more than 8 hours a day in front of their gadgets. Interviews with the parents and the adolescents revealed various reasons why they preferred to continue using gadgets for extended periods.

For instance, DR (11 years old) revealed in his interview, "I can't stop playing games because if I don't play, I don't know what else to do. My friends also play games, so it's more fun to play together" (Interview, January 15, 2024). Similarly, BQ (10 years old), who spends even more time—13 to 15 hours a day—said, "Every day, I mostly play TikTok and YouTube. Sometimes I lose track of time; it's so much fun watching funny videos and laughing with my friends on WhatsApp" (Interview, January 16, 2024). BQ stated that social media and YouTube videos had become his main source of entertainment while playing games has become an inseparable activity.

In an interview with HL (14 years old), she revealed another reason for gadget addiction, "I spend most of my time watching content on Instagram. Sometimes when I get hooked, I don't realize how time flies. Not only that, I also often chat with friends, so I don't want to miss any news" (Interview, January 17, 2024). AN (12 years old)

shared a similar reason, saying, "Games are like my own world. If I don't play, I feel like I can't join in the conversation with my friends. They're all playing games, so I don't want to be left behind" (Interview, January 17, 2024). AN expressed that he was more interested in the entertainment offered by games and social media.

FS (13 years old) also shared his view on excessive gadget use, saying, "I often open Instagram WhatsApp and play games to pass the time. If not, I feel like I don't have anything else fun to do" (Interview, January 16, 2024). FS acknowledged that this gadget use affected his life, but he found it hard to break the habit.

Interviews with parents revealed that many of them were concerned about the negative effects of excessive gadget use on their children. A mother of HL (14 years old) said, "I've often told him not to play with gadgets for too long. But he still can't stop. Sometimes, he even forgets to eat" (Interview, January 17, 2024). Another parent, the mother of BQ (10 years old), shared the same sentiment: "My child can lose track of time when he's using his gadgets. He sometimes only realizes it's late at night" (Interview, January 16, 2024). This raised concerns among parents about the potential negative effects, such as sleep disturbances, reduced social interaction, and the impact on academic performance.

Gadget addiction among children and adolescents in Perlis Village seems to be increasingly worrying, especially due to the high intensity of use. Children predominantly spend their social media usage on less productive activities, such as excessive video watching and gaming. If used for positive activities like regular learning, gadgets could serve as a valuable tool for development, but unfortunately, this is not happening. From the interviews, it was clear why they found it difficult to detach from digital devices. DR (11 years old), for instance, revealed, "Games are like a part of my life. If I don't play, I feel like I can't do anything. My friends are playing too, so I don't want to miss out" (Interview, January 15, 2024). This shows that gadget addiction is not only about personal entertainment but also ties into social interaction with their peers, most of whom connect through games and social media. Their increasing connection with friends further exacerbates this addiction through chat apps, games, and social media, which they use for hours every day.

Gadget addiction in Perlis Village is not only affecting the children's personal lives but also their social lives. Excessive gadget use reduces children's social interaction with their peers in real life. One of the most apparent impacts is the decreased participation in social activities, such as religious studies, communal prayers, and physical activities together. In interviews with residents, many expressed concern that children prefer staying home to play gadgets rather than participate in community activities. "Children are becoming lazy to study in the *surau*, perform communal prayers, and gather for physical activities. They prefer to stay home, playing with their gadgets" (Junaidi Salim, Village Head of Perlis, Interview, January 14, 2024).

This impact is more visible in the community service life in Perlis Village, which is part of their culture. Activities like the night watch, which used to be an important part of village social life, are now rarely attended by the younger generation. "The community service habits, like night patrols, are no longer popular among children. They prefer sitting at home with their gadgets," said the village head, who expressed concern about this phenomenon (Junaidi Salim, Village Head of Perlis, Interview, January 14, 2024). The residents of Perlis Village deeply regret this change, as they believe that social activities and community solidarity play a vital role in strengthening social bonds and maintaining harmony among villagers.

Gadget addiction also impacts the family aspect. Parents who were initially concerned about the excessive use of gadgets began to notice behavioral changes in their children, such as becoming more disobedient, lazy to study, and uninterested in family activities. Several parents reported that their children were becoming more rebellious and neglecting household chores. Additionally, sleep disturbances became a major issue. Many children stay up late playing games or watching videos on social media, leading them to feel lethargic and often sick. Gadget addiction also added financial burdens on families, particularly as they had to spend more money on internet data plans every few days.

Dr. AM, a public health monitor in Perlis Village, expressed concern about the physical impacts of gadget addiction, which has spread among adolescents. In an interview, he said,

"We are starting to see many children complaining about health problems due to staying up late playing gadgets. Complaints like headaches, fatigue, and loss of appetite are becoming more frequent. We are also concerned about sleep disorders that could negatively affect their growth. Additionally, obesity issues are

starting to emerge because many children prefer sitting for long hours in front of screens rather than engaging in physical activities” (Interview, January 14, 2024).

Interviews with several parents in Perlis Village showed that gadget addiction has changed the social and cultural patterns in the village. This addiction not only affects children but also creates concern among parents and the community, who worry about its long-term impacts on the social and cultural development of the younger generation. The negative effects of excessive gadget use highlight the importance of collaborative efforts to address this issue from the family, community, and governmental sides.

These findings show that gadget addiction is not just an individual problem but a social phenomenon that affects the entire community, including families. Excessive digital activity has diverted children and adolescents' attention from healthier physical and social activities. In this context, the phenomenon of gadget addiction in Perlis Village has the potential to hinder their social and physical development. Therefore, there is a need for efforts to redirect their attention to more beneficial activities that can involve social interaction, one of which is through traditional games that are more physical and interactive.

The Role of Traditional Games in Reducing Gadget Addiction

With the advancement of technology, the phenomenon of gadget addiction among adolescents has been increasing. This phenomenon has drawn significant attention in many villages, including Perlis Village in North Sumatra, where the negative impact of gadget addiction on the lifestyles of children has been observed. Gadget addiction not only affects social interactions but also reduces participation in social activities such as religious studies and communal prayers, which have become less common among the village's children and adolescents (D. Sari, 2020). Therefore, the residents of Perlis Village initiated efforts to revive traditional games that had long been forgotten, hoping to reduce children's dependency on gadgets and restore them to a healthier social life.

Traditional games such as *Rimau Langkat*, kites, stick games, and marbles are well-known and have been a part of the village's culture for a long time. However, with the advent of digital technology, interest in these traditional games began to fade. The residents, particularly the parents, became concerned that their children were increasingly isolated in the digital world, spending their time in front of screens instead of interacting directly with their peers. The initiative to revive these traditional games arose from this concern, along with the awareness of the importance of preserving local culture and reducing dependence on technology.

After an initial observation in January 2024, the researcher returned in August 2024 to assess further developments. The changes observed were quite significant. Children who once seemed addicted to gadgets now showed healthier behavior. They reduced their screen time and were more often seen gathering with their friends in the field to play traditional games. Observations showed that traditional games such as *Rimau Langkat*, kite flying, stick games, and marbles became the preferred activities for children who previously spent most of their time on gadgets.

According to Junaidi Salim, the village head of Perlis, this initiative began out of concern as residents noticed the loss of traditional culture among their children. One of the main causes was the widespread use of gadgets among children. Not only did it reduce social interactions between the children, but it also disrupted religious activities in the village, such as religious studies and communal prayers. “We see children participating less in religious studies and communal prayers. We believe this is because they are more interested in their gadgets. We also face difficulties controlling the internet data costs, which keep rising if they continue to use gadgets” (Interview, August 19, 2024). Therefore, the residents initiated the revival of traditional games by building supporting infrastructures, such as pavilions or children's play areas, known locally as “*gaung*.” Additionally, they cleaned and improved the playing fields to make the children feel more comfortable playing outdoors.

Collaboration with parents became the key to the success of this initiative. The village residents worked together to limit gadget use at home. Parents became more strict about controlling the time their children spent on gadgets and directed them to play in the fields after school. As a result, children began playing traditional games again, which not only reduced gadget addiction but also improved physical skills, social interaction, and a sense of community.

In interviews with several children involved in this initiative, the researcher gathered information that they felt happier playing with their friends in the field rather than constantly using gadgets. One child, FS (13 years old), said, “I used to play with my phone a lot, but now I prefer playing *Rimau Langkat* and flying kites. It's more fun because I can meet my friends and we can play together” (Interview, August 22, 2024). Another child, AN (12 years old), added, “Now after school, I go straight to the field. It's more fun to play outside than just stay at home using

gadgets” (Interview, August 22, 2024). These interviews showed that children were becoming more interested in physical activities, which were not only fun but also brought them closer to their peers.

Moreover, interviews with parents also revealed significant changes in how they managed their children's time. One mother, M (40 years old), expressed, “At first, I struggled to manage my child's time as they often used gadgets. But after we agreed to limit their phone time and encouraged them to play outside, they became more active and happier” (Interview, August 22, 2024). A father, D (42 years old), shared a similar experience, “We fully support this initiative. After the children played outside more often, we noticed that they became healthier, more active, and their interactions with their peers improved” (Interview, August 22, 2024). This proves that collaboration between the community, parents, and children is crucial in reducing gadget addiction and guiding them back to more beneficial activities.

It is important to note that while these positive changes occurred, challenges remain, particularly for children who are heavily addicted to gadgets. However, the approach used by peers, encouraging them to play outside, proved effective. When children who were already addicted to gadgets felt left out by their friends, they felt compelled to join and interact more outdoors. One child, BQ (10 years old), who initially spent more time with gadgets, said, “At first, I didn't want to play in the field because I was used to playing with my phone. But after my friends didn't want to play with me if I kept using gadgets, I decided to join the *Rimau Langkat* game, and it turned out to be fun” (Interview, August 22, 2024).

Participatory observations also confirmed that shifting activities from gadgets to traditional games not only helped children reintegrate socially but also improved their physical skills. Through traditional games, children develop gross motor skills such as running, jumping, and hand-eye coordination, which cannot be acquired by using gadgets. Additionally, games like *Rimau Langkat* and marbles taught the importance of teamwork, strategy, and a sense of togetherness.

Figure 1. The “Guli” or Marbles Game Played by Children in Perlis Village



Source: Research Findings, 2024.

The relationship between traditional games and the topic of this research clearly demonstrates that traditional games effectively divert children's attention from gadget addiction, which in turn helps them socialize more and reduce their dependency on technology. This process of redirection depends not only on individual desires but also on environmental support, particularly from family and peers. Parents who impose strict limits on gadget usage, as well as friends who encourage outdoor activities, play a crucial role in the success of this initiative.

Supporting evidence for this finding comes from the observations of changes in children's behavior during the research process, as well as interviews with parents who observed a reduction in their children's gadget usage. As

reported by the parents of children who were once addicted to gadgets, there was a significant change in how they managed their children's time, with children now spending more time outside playing traditional games.

The success of traditional games being played again by children and adolescents in Perlis Village is not only due to collaboration between the community and parents but also due to a shared awareness of the importance of preserving local culture and rebuilding healthier social relationships. This initiative successfully reduced children's dependence on gadgets and provided them with opportunities to develop better social and physical skills. Therefore, this initiative can serve as a model for other villages facing similar issues and for revitalizing traditional games as part of efforts to maintain a balanced life in the digital age.

Positive Impacts of Traditional Games on Social Interaction and Physical Health

The traditional games reintroduced in Perlis Village not only serve as a form of entertainment for children but also function as an effective medium to enhance social interaction physical skills, and improve the quality of social relationships in the rural environment. Based on the data obtained, children involved in traditional games showed significant improvement in motor coordination, teamwork, and a sense of community. Children have now found traditional games, which they had almost forgotten, to be an attractive alternative to divert their attention from gadget addiction that had previously disrupted their social activities.

One popular traditional game among children in Perlis Village is *Rimau Langkat*, which originated from the Langkat region in North Sumatra. A group of around 15 boys typically plays this game. To play *Rimau Langkat*, children gather in an open area, often at the beach, and sometimes smear their bodies with mud to make the game more challenging and slippery. The game begins with the selection of one person to be the "tiger" and others as "prey" who must avoid being caught. The other children form a circle around the tiger while the prey runs outside the circle (Haddina & de Napoli, 2022). The objective of the game is for the tiger to break through the circle and capture the prey while the prey tries to avoid being caught by entering the circle. This game sharpens physical skills such as speed and agility and fosters teamwork because the players forming the circle must coordinate with each other. For the children involved, *Rimau Langkat* teaches them to socialize, interact with peers, and strengthen the social bonds within their community (Nuraida & Saragi, 2023).

Figure 2. Kite Flying Game



Source: Research Findings, 2024.

In addition to *Rimau Langkat*, kite flying is another game that is highly popular among children in this village. Kite flying is a game that involves a thin sheet of material with a frame, flown using wind and controlled by a string or thread. This game is relatively simple and affordable, as children can either make their kites or buy them at a low price. In this game, children compete by trying to cut the string of the opponent's kite using their own controlled kite (Andriani & Sari, 2024). Besides being an entertainment activity, kite flying can also become a competitive event that trains fine motor skills and strategy in controlling the kite to win the match. In this process, children learn to communicate and cooperate, especially when working together to defeat their opponents. This game cultivates a sense of healthy competition and social skills, which is highly beneficial for building social relationships among them (Abdul Halim et al., 2024).

The marble game, or “*guli*,” is another traditional game that children frequently play in Perlis Village. In this game, children use marbles and play by throwing them into a hole or using other techniques to collect marbles from their opponents. This game teaches hand-eye coordination and helps improve precision and concentration. Although simple, this game is very popular because it can be played by many children at once and requires great skill in aiming the marbles (Hidayati, 2020).

Additionally, stick games are another favorite game among children in Perlis Village. This game relies on speed and agility, where children must chase each other using sticks to catch their opponents. This game increases physical strength, agility, and endurance in situations that require strategy and teamwork. It teaches children to work together in a group, fostering a strong spirit of family and community (Ardipal, 2019).

Figure 3. Stick Game



Source: Research Findings, 2024.

The involvement of children in various traditional games plays a significant role in reducing gadget addiction and promoting healthier social interactions. Moreover, these games provide essential physical benefits. Children involved in these traditional games have been shown to experience improvements in gross motor skills such as agility, hand-eye coordination, and body balance. This is crucial for their physical development as they move more and interact directly with their peers outdoors.

Interviews with several parents showed significant positive changes in their children's social relationships after they became active in traditional games. A mother, M, expressed her joy, saying, “My child used to stay inside and play with their phone a lot, but after they started playing *Rimau Langkat* and kite flying, they spend more time with their friends. Now, they play together outside more often, and I'm happy because they are healthier and happier” (Interview, August 22, 2024). M noticed not only changes in her child's social habits but also observed positive improvements in her child's physical health. Previously, her child was often stuck in a passive routine, spending time indoors and playing with gadgets. However, after engaging in traditional games, her child became more physically active, contributing to better physical fitness.

The positive impact of these traditional games was also acknowledged by D, a father, who said, “I've seen a huge change in my child since they started playing marbles and stick games. They are more active and no longer lazy. They cooperate and are more concerned about their friends” (Interview, August 22, 2024). In addition to improving their social relationships, these traditional games had a significant positive impact on the children's physical well-being. D observed that his child, who previously preferred staying alone at home, now spends more time playing outside with friends. Not only that, but his child has also become happier and more energetic, which obviously impacts the quality of their everyday life.

The changes observed by parents are also in line with the experiences shared by the children who were previously addicted to gadgets. For example, DR, who initially struggled to break free from a gaming addiction,

said, "I always used to play with my phone, not knowing what else to do but play games. But after I started playing Rimau Langkat and kite flying, I went outside more often and played with my friends. It's more fun, and I feel healthier" (Interview, August 22, 2024). DR acknowledged that these traditional games not only diverted attention from gadgets but also made them feel happier because they could interact directly with their peers. DR noticed clear physical benefits, such as increased stamina and better fitness from moving around more. Mentally, DR felt lighter and happier because activities involving social interaction positively impacted their mood and reduced stress.

Similarly, BQ, who previously spent most of their time watching TikTok and YouTube for hours, said, "Now I play marbles and kite flying more often. It's more fun than just watching videos on my phone. I laugh more and hang out with my friends, and my body feels stronger from playing outside" (Interview, August 22, 2024). BQ reported that traditional games made them feel more connected with their friends, and they clearly experienced health benefits, such as a healthier body and a better mood. BQ also mentioned that they felt more motivated to study and fulfill their responsibilities after reducing screen time and becoming more physically active.

In addition to physical health benefits, another positive change was an improvement in religious practices and adherence to family rules. Both DR's and BQ's parents reported that their children became more diligent in participating in religious activities, such as communal prayers, after spending more time outdoors and engaging in social interactions. DR's mother said, "Previously, my child was reluctant to join communal prayers and religious studies. But now, they are attending prayers again, and it makes me happy because they are getting closer to religion" (Interview, August 22, 2024). Likewise, BQ's father reported, "My child has also become more interested in learning and participating in religious studies after playing outside more often. They no longer spend all their time on games" (Interview, August 22, 2024). This shows that reducing gadget addiction not only brought about positive changes in children's social and physical interactions but also their relationship with religion and family.

Furthermore, traditional games also influenced family financial management. Many parents reported that after their children began playing traditional games, they spent less money on internet data. "I used to have to keep buying data packages because my child was always on their gadget. But now, they spend more time outside, so I don't need to spend as much on data anymore" (Interview, August 22, 2024).

In other words, traditional games not only have a positive impact on children's physical and mental health but also offer financial benefits for parents in terms of family budget management. Children who spend more time playing outside and reduce their gadget use show an improvement in their quality of life, both physically, mentally, and socially. This demonstrates that local wisdom in the form of traditional games can be an effective solution to address gadget addiction issues while providing broader benefits for family and community life.

This finding shows that local wisdom through traditional games can be a relevant solution to address the negative impacts of gadget addiction on adolescents in rural villages. These traditional games offer children opportunities to develop essential social and physical skills that they may not obtain through digital activities. Furthermore, through these games, children learn to appreciate togetherness, cooperation, and healthy competition in their environment, which in turn strengthens social bonds within their community.

Discussion: The Role of Traditional Games in the Social Life and Health of Adolescents

This study finds that gadget addiction among children and adolescents in Perlis Village is not just a personal issue but also a social phenomenon that impacts social interaction, physical health, and participation in community activities. The results show that traditional games, such as *Rimau Langkat*, kite flying, marbles, and stick games, can serve as an effective solution to reduce gadget addiction, return children to healthier physical activities, and strengthen their social bonds. In the social and cultural context of the village, reintroducing traditional games helps reduce dependence on technology and provides children with a space to develop social and physical skills that gadget addiction has caused them to lose.

The findings of this research indicate that even though modernity and technological advancement have changed many aspects of societal life, local traditions, particularly traditional games, still hold great potential to address social problems caused by these changes. In this context, the study aligns with sociological theories, especially Pierre Bourdieu's (2018) theory of habitus and social power. Bourdieu argued that a person's habits or lifestyle (*habitus*) are shaped by their social and cultural environment and can be influenced by external factors such as technology and mass media. In this case, active efforts to return children to healthy social and physical interactions through traditional games can change the habitus formed by the habit of playing with gadgets. The findings of this study also support Emile Durkheim's (1982) theory of social change, which suggests that societies change when there is a dysfunction in social norms and values. In this case, gadget addiction creates dysfunction in children's social relationships, which the reintroduction of social values through traditional games in the community can repair.

The implications of these findings are highly relevant, especially in efforts to mitigate gadget addiction among children and adolescents in rural communities. This finding shows that traditional games not only offer entertainment value but also have educational and social benefits that can improve the social life quality of children (Hutagalung et al., 2022; Junaedi et al., 2023). Therefore, this research provides important insights for policymakers, educators, and communities to explore and preserve local culture as part of the solution to gadget addiction. Moreover, traditional games can be a healthier alternative for physical and social activities compared to digital activities, which tend to be passive and isolating.

This study also shows that gadget addiction among children and adolescents in Perlis Village occurs due to the dominance of technology in their lives, which reduces social interaction, physical activity, and participation in social and religious activities. This is also related to changes in the lifestyle of rural communities, which previously relied more on physical interaction outdoors and involvement in community activities (Clendenning, 2024; Novianto et al., 2022). The dependency on gadgets, as found in interviews with children and parents, is a result of the increasingly developed digital culture that offers the convenience of entertainment without leaving the house. Insufficient parental supervision and a lack of understanding of the importance of regulating gadget use in children's lives further exacerbate this addiction.

CONCLUSION

This study reveals that the reintroduction of traditional games can effectively address gadget addiction among children and adolescents in Perlis Village, Berandan Barat District, Langkat Regency, North Sumatra Province. The results show that traditional games such as *Rimau Langkat*, kite flying, stick games, and marbles not only reduced dependence on gadgets but also enhanced physical skills, social interaction, and a sense of togetherness among children. The gadget addiction, which initially led to a decrease in participation in social activities such as communal prayers and religious gatherings, has now shown positive changes, with children engaging more in direct interaction and becoming more active in outdoor activities. The novelty of this study lies in the finding that local wisdom, which has often been considered less relevant in the digital age, can offer concrete solutions to the social issues caused by technology.

This study contributes significantly to the development of the concept of social interventions based on local wisdom, particularly in rural areas. Through this approach, traditional games are not only a source of entertainment but also have high educational and social value, returning children to a healthier and more balanced life. The contribution of this study also provides new insights into the importance of managing children's use of technology and encourages awareness about the importance of preserving local culture as part of the solution to gadget addiction issues. The participatory observation method used in this study successfully provided in-depth insights into the behavioral changes of children and their impact on the social dynamics in Perlis Village.

However, this study also has limitations, particularly in its scope, which is confined to one village and a few children as research samples. Therefore, researchers should conduct further studies in other areas with larger and more diverse samples to achieve broader generalizations. Additionally, this study has not measured the long-term impact of shifting children's activities from gadgets to traditional games. Future research could focus on a deeper evaluation of the sustainability of behavioral changes in children after they engage in traditional games, as well as the role of families and communities in maintaining a balance between technology and local wisdom in children's lives.

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