EduBasic Journal: Jurnal Pendidikan Dasar
Vol. 5 No. 2, October 2023, pp. 203-212
https://ejournal.upi.edu/index.php/edubasic

The Influence of Gadget Use on The Development of Social Interaction in Children Aged 5–6 Years

Wahyu Nofiyanti[1]✉, Reza Edwin Sulistyaningtyas[2], & Febru Puji Astuti[3]

[1]✉Universitas Muhammadiyah Magelang, pgpaud@unimma.ac.id, Orcid ID: 0009-0008-8727-1909
[2] Universitas Muhammadiyah Magelang, reza.edwin@unimma.ac.id, Orcid ID: 0000-0001-5429-1470
[3] Universitas Muhammadiyah Magelang, februpuji@unimma.ac.id, Orcid ID: 0000-0002-9418-671X

Article Info

History of Article
Received:
29 October 2023
Revised:
29 November 2023
Published:
12 December 2023

Abstract

Various studies and child development experts highlight the risks of using gadgets in early childhood. A gadget is a small electronic device with various special functions that could potentially influence children's development. The research method used was quantitative, with a type of correlation research aimed to determine the relationship between variables of gadget use and social interaction development. The data collection technique employed a SAS (Smartphone Addiction Scale) questionnaire sheet to measure the use of gadgets and utilized Ages and Stages Questionnaires: Social Emotional (ASQ: SE) second edition to measure social interaction. The samples involved were children aged 5–6 years, totaling 39 children, 18 boys and 21 girls. The sampling technique used was purposive sampling, which used appropriate categories or criteria to be studied in selecting the sample, namely children aged 5 -6 years. This research revealed that using gadgets influenced the development of social interactions in early childhood by the sig. value of -0.500 indicating the correlation. Children use gadgets because they are more interesting, responsive, and full of challenges than playing with friends in the surrounding environment. Based on the results of this research, the implication is providing parenting to people regarding the impact of gadget use on social interactions.

Keywords: Children's Development, Early Childhood, Gadget Use, Social Interaction

How to cite: Nofiyanti, W., Sulistyaningtyas, R. E., & Astuti, F. P. (2023). The influence of gadget use on the development of social interaction in children aged 5–6 years. *EduBasic Journal: Jurnal Pendidikan Dasar, 5*(2), 203-212.

e-ISSN: 2549-4562, p-ISSN: 2987-937X

Info Artikel

Riwayat Artikel
Diterima:
29 Oktober 2023
Direvisi:
30 November 2023
Diterbitkan:
12 Desember 2023

Abstrak

Berbagai penelitian dan ahli perkembangan anak menyoroti risiko penggunaan gadget pada anak usia dini. Gadget merupakan suatu perangkat elektronik kecil yang memiliki berbagai fungsi khusus dan berpotensi dapat mempengaruhi perkembangan anak. Metode penelitian yang digunakan yaitu metode kuantitatif dengan jenis penelitian korelasi yang bertujuan untuk mengetahui adanya hubungan antara variabel Penggunaan Gadget terhadap perkembangan Interaksi Sosial. Teknik pengumpulan data menggunakan lembar angket SAS (Smartphone Addiction Scale) untuk mengukur penggunaan Gadget dan Ages & Stages Questionnaires: Social Emotional (ASQ:SE) edisi ke dua untuk mengukur interaksi sosial. Sampel yang digunakan yaitu anak usia 5 – 6 tahun berjumlah 39 anak dengan anak laki – laki berjumah 18 anak dan anak perempuan 21 anak. Teknik sampling yang digunakan adalah purposive sampling yang mana dalam memilih sampelnya menggunakan kategori atau kriteria yang sesuai untuk diteliti, yaitu anak yang berusia 5 -6 tahun. Hasil dari penelitian ini yaitu penggunaan Gadget berpengaruh terhadap perkembangan interaksi sosial anak usia dini dengan nilai signifikansi -0.502 yang menunjukan adanya korelasi. Penggunaan gadget pada anak disebabkan karena gadget lebih menarik, responsif dan penuh tantangan dibandingkan bermain dengan teman di lingkungan sekitarnya. Implikasi yang diberikan berdasarkan hasil penelitian ini adalah pemberian parenting kepada orang terkait dampak penggunaan gadget terhadap interaksi sosial.

Kata Kunci: Perkembangan Anak, Anak Usia Dini, Penggunaan Gadget, Interaksi Sosial

Cara Mensitasi: Nofiyanti, W., Sulistyaningtyas, R. E., & Astuti, F. P. (2023). The influence of gadget use on the development of social interaction in children aged 5–6 years. *EduBasic Journal: Jurnal Pendidikan Dasar, 5*(2), 203-212.

e-ISSN: 2549-4562, p-ISSN: 2987-937X

INTRODUCTION

In this sophisticated era, gadgets have become a major need for both children and adults. Gadgets are not only communication tools but can also help make other activities easier. Gadgets are small electronic devices with many functions. Gadgets have many functions for their users, so they are considered to make carrying out daily activities easier. Gadgets can also be categorized as portable electronic devices, as they are not connected to an electrical socket when used. Gadgets also have various interesting, varied, interactive, and flexible features and applications, increasing their appeal to everyone, including older people, young teenagers, and even children. Young children use various electronic gadgets, such as televisions, smartphones, computers, laptops, tablets, iPads, game consoles, and others, and operate touch screens easily (Sowmya & Manjuvani, 2019). Therefore, parents are often found giving gadgets, especially in the form of smartphones, to children at an early age.

According to the National Association for the Education of Young Children (NAEYC), early childhood is children aged 0-8 years. At that age, development occurs very rapidly (Talango, 2020). This age is crucial for forming a child's character, personality, and intellectual abilities. During this period, there was a process of growth and development in various aspects. This age is also a unique phase of life. It is during a process of change in the form of growth, development, maturation, and perfection, both in physical and spiritual aspects, which lasts a lifetime, gradually and continuously (Khairi, 2018).

Previous research involving 186 mothers with children aged 3-6 years uncovered that 79.6% of children had used cell phones (Jang & Jeong, 2015). Other findings stated that of the 192 parents of preschool children respondents, around 92% answered that their children used smartphones or tablets (McCloskey et al., 2018). Apart from that, the activities carried out by children when playing with gadgets are based on a study (Genc, 2014) involving 85 parents who had children aged 3-6. The results showed that the majority of children's use of smartphones was for playing games (58, 82%), while other applications were related to educational applications (26.47%) and games for learning (14.70%). Other findings revealed that children's activities when using gadgets included playing games (38%), games for learning (19%), and watching (3%) (Mayenti & Sunita, 2018). Based on previous research, it can be said that most children use gadgets to play fun games.

Additionally, the time spent by children aged 2-6 years using gadgets, according to the results of research conducted by Susilowati et al. (2021), is that they spent more than one hour in front of the screen per day. Meanwhile, according to the American Academy of Pediatrics, the conditions for children spending time in front of the screen are that 1) up to the age of 18 months, screen time is only for video chatting with parents (parents are out of town), 2) children aged 18-24 months, screen time is limited to watching educational programs with a caregiver, 3) children aged 2-5 years, screen time is limited to 1 hour on weekdays and 3 hours on weekends, and 4) over 6 years old, they are encouraged to adopt healthy habits and screen time limited (Chen & Adler, 2019).

In fact, early childhood is a time when humans grow and develop physically and psychologically. Growth and development can be seen from body weight, height, and head circumference, while development can be seen from motor, social, emotional, language, and cognitive abilities (Prastiwi, 2019; Utami & Alifah, 2022). Children should move a lot early so that their body develops optimally. Suppose children only focus on being in front of gadgets in childhood. In that case, their social development may be less than optimal, including the development of social interaction.

In general, interaction can be interpreted as being interconnected or reacting to each other and occurring between two or more individuals (Pebriana, 2017). Meanwhile, the term ‘social’ is related to society (Witarsa et al., 2018). Social interactions are social relationships that involve relationships between individuals, individuals and groups, and groups and groups (Viandari & Susilawati, 2019). Social interaction is a process in which individuals and individuals, individuals and groups, or groups and groups relate to one another (Fahri & Qusyairi, 2019).

Social interaction is a social intensity that regulates how people behave and interact with one another. Social interaction is also the basis for creating patterned social relationships called social structures. Social interaction can also be seen as a social process in which one orients oneself towards others and acts in response to what others say and do. Specifically, early childhood children learn a lot through playing. Playing with peers will help them develop social skills, speaking skills, and the ability to share.

Early childhood experiences development in the exploration stage and interacts directly with the surrounding environment. Young children are usually happy with new things they get through playing activities. It is not uncommon for children to play and satisfy their curiosity through gadgets because gadgets are interesting things for them, especially with applications, including online games, YouTube, and TikTok, which are available on gadgets, so most of them spend all day playing gadgets. In fact, children at their age should play and mingle with their peers. The reality is that not many children prefer to play with gadgets in the middle of activities and socialization. This is confirmed by a survey conducted by Siemens Mobile Lifestyle III, which found that 60% of respondents preferred sending messages and/or reading messages while playing online games in the middle of family events and where these individuals considered these events boring (Retalia, 2020).

As a result, gadgets can isolate children from direct social interactions, which play an important role in developing social skills. Children may be less skilled at reading facial expressions, interpreting nonverbal signals, and responding to social situations due to this lack of direct experience. Besides, excessive use of gadgets will cause speech or language delays. Limited social interaction with parents or peers can hinder speaking, understanding, and communication skills (Nurliana & Aini, 2021).

If this continues continuously, it is feared that it will disrupt the process of social interaction in early childhood. Children should be able to interact well with the surrounding environment; however, with gadgets, this interaction will experience serious disturbances, and even the children will no longer have any interaction with the surrounding environment. It will have a bad impact on their life. Many young children use gadgets, and parents let their children use them. They prefer to give gadgets to their children rather than see them cry, and they use gadgets as a substitute for their children's caregivers because parents are busy working. The tendency to use gadgets excessively will also result in a person not caring about the surrounding environment, both in the family and community environments (Yuniarnia & Surjaningrum, 2023).

As research has been conducted by Munisa (2020), the results of observations demonstrated that these children more often used gadgets to operate game applications, both educational and entertainment games, compared to playing with their peers. This cannot be separated from the various game applications found on children's gadgets, which attract their attention more than the games found in the surrounding environment (Afdalia & Gani, 2023). In line with a study conducted (Adwiah & Diana, 2023), gadgets influence social development, and the habitual use of gadgets by children makes children more alone and rarely interact with friends their age. Apart from that, a study by Oktaviana (2021) concluded that gadgets greatly influence the social interaction abilities of young children because they spend more time playing with gadgets than playing with their peers.

Through observation activities in Tlogowungu Village, Kaloran Sub-district, Temanggung Regency, most young children expressed that using gadgets was more fun than playing with friends. Hence, this research is vital to understanding how gadgets influence social skills and developing strategies to help individuals face the challenges of continuous technological developments. This research can also provide a basis for creating guidelines and policies that support the balanced and responsible use of gadgets, especially in early childhood. Based on observations in Tlogowungu Village, Kaloran Sub-district, Temanggung Regency, most children aged 5–6 years, totaling 39 out of 115, said using gadgets was more fun than playing with friends.

Departing from the explanation above, this research was conducted with the aim of investigating the influence of gadget use on the development of social interaction in children aged 5–6 years in Tlogowungu Village, Kaloran Sub-district, Temanggung Regency.

METHODS

This research employed quantitative methods. This type of correlation research was aimed to determine the relationship between variables of gadget use and social interaction development. This research was conducted in Tlogowungu Village, Kaloran Sub-district, Temanggung Regency, with a population of 115 young children in Tlogowungu Village. The samples involved were 39 children aged 5–6 years, 18 boys and 21 girls. The sampling technique utilized was purposive sampling, wherein selecting the sample, appropriate categories or criteria were used for research, i.e., children aged 5-6 years who were in Tlogowungu Village, Kaloran Sub-district, Temanggung Regency.

The data collection technique used was a questionnaire. This research instrument employed a questionnaire sheet to collect data on using gadgets and social interactions of children aged 5-6 years. The instrument used to measure gadget use was the SAS (Smartphone Addiction Scale) questionnaire sheet, which was adopted from research (Hartati et al., 2023). The assessment on this instrument used the criteria never (1), rarely (2), often (3), and always (4). The instrument to measure social interaction also used the second edition of the Ages & Stages Questionnaires: Social Emotional (ASQ: SE) (Cesilia et al., 2022). The instrument was addressed to the parents of each child. Assessment on ASQ: SE used the criteria of always, sometimes, never, and needs attention. Moreover, the data processing technique utilized the parametric Pearson correlation test.

After obtaining the data, observations were made regarding the children's social interactions. The observation data were then analyzed utilizing the IMB SPSS Statistics 22 program, which was tested for 95% confidence. First, the normality of two variables, i.e., gadget use and social interaction, was tested. The next step was to test homogeneity and linearity. If it was proven normal, the next step was to analyze the data using validity and reliability tests. This was carried out to determine whether there was an influence between the use of gadgets and the development of interaction in children aged 5-6 years in Tlogowungu Village, Kaloran Sub-district, Temanggung Regency.

Instrument validation can be valid if the r-calculated value > r-table value, with a sig value of 0.05. In testing the validity of gadget use instruments with a Pearson correlation range of 323 to 488, it is known that the instrument used in this research was valid. The validity test of the social interaction instrument, ranging from Pearson correlation of 199 to 788, also found that the instrument used in this research was valid. Furthermore, the reliability test can be trusted if the value is > 0.6. From the reliability test of using gadgets with a Pearson correlation range of 0.723 to 0.786, it is known that the instrument was reliable. The reliability test revealed that the instrument was reliable for social interaction, with a Pearson correlation range of 0.610 to 0.642.

RESULTS AND DISCUSSION

The table below describes data on gadget use among 39 respondents of children aged 5-6 in Tlogowungu Village, Kaloran Sub-district. Temanggung Regency.

Table 1. Demographic Data

Aspects	Item	%
Children's Age	5 years	23%
	> 5 years	46%
	6 years	31%
Gender	Boys	46%
	Girls	54%
Gadgets Ownership	Owned	19%
	Parents	81%

Table 1 is divided into three categories: period of gadget use, child's gender, and gadget ownership status. Meanwhile, the age range of children is divided into three categories in different numbers. Children aged 5 years amounted to 23%; children aged > 5 amounted to 46%; meanwhile, children aged 6

years amounted to 31%. Table 2 illustrates the number of children in gender categories, described as follows. The use of gadgets among boys was 46%, while girls were 54%. Gadget ownership is divided into two categories: own ownership at 19% and parental gadget ownership at 81%.

Gadget use in early childhood could have a significant impact on their development. These impacts can be negative and positive. The impact undoubtedly arises depending on how it is used. As an explanation of the positive impact of using gadgets for children, if used properly, they can be used as an interesting learning medium to provide meaningful learning for children. Apart from that, the use of interactive educational game media can certainly improve logic through these games. The use of gadgets certainly does not only have a positive impact.

Conversely, suppose it is not used or utilized properly. In that case, it will have negative impacts, such as dependence on gadgets and technology, vulnerability to exposure to inappropriate content, and even containing ethnicity, religion, race and intergroup discrimination and pornography, disrupting children's language and social and even physical development. It can also disrupt health, especially eye health, due to exposure to light from the gadget itself. This can happen if parents cannot provide supervision and affirmation and properly approach their children towards gadgets. Apart from that, the impact of using gadgets for too long or spending too much time in front of gadget screens can interfere with children's social skills development. Children aged 2–4 years have a maximum screen time of an hour per day, or it could be said that the shorter the time, the better (Nurhamida et al., 2023). Less direct interaction with others can affect their ability to communicate and interact with peers. This aligns with the results of these studies, which show a significant correlation between using gadgets and developing children's social interactions (Nurliana & Aini, 2021).

The result of data collection in data of gadget use and social interaction from respondents can be seen in Table 2 below.

Table 2. Data of Gadget Use and Social Interaction

Data	Total Score	Average Score
Gadget Use	1312	33.641
Social Interaction	3490	89.487

In Table 2, filling out the questionnaire regarding gadget use and social interaction obtained a total score of 1312 and 3490, respectively, with 39 respondents. Meanwhile, the average for gadget use was 33.641026, while for the social interaction questionnaire, it amounted to 89.48718. Furthermore, data on the distribution of filling out the social interaction questionnaire in the gender category is depicted in the following table.

Table 3. Data of Social Interaction by Gender

Data	Total Score	Average Score
Boys' Social Interaction	1535	85.277
Girls' Social Interaction	1856	88.830

Table 3 illustrates the number of social interaction questionnaires filled in for gender categorization. The total number of boy-gender social interactions was 1535, averaging 85.2777778. Meanwhile, girls' social interactions reached 1856, with an average value of 88.380952. The data was then analyzed using a correlational formula.

Table 4. Pearson Correlation Results of Gadget Use with Social Interaction

		Gadget Use	Social Interaction
Gadget Use	Pearson Correlations	1	.111
	Sig. (2 tailed)		-.502
	N	39	39
Social interaction	Pearson Correlations	.111	1
	Sig. (2 tailed)	-.502	
	N	39	39

The result of the questionnaire showed that the average score of gadget use is less than the social interaction. The result of the correlational test can be seen in Table 4. Based on Table 4, gadget use was negatively related with a significant value of -0.502 to social interaction in early childhood with a moderate degree of correlation. The negative value of correlational value means that the higher the gadget use, the lower the social interaction.

Discussion

In this study, the use of gadgets in early childhood significantly impacted their interaction and health. These impacts included physical health problems, such as posture problems, resulting in posture problems, e.g., back and neck pain. Additionally, excessive physical inactivity often reduces the time that can be spent on physical activity, which can contribute to obesity and other physical health problems. Also, the use of gadgets will have an impact on sleep disorders, which can lead to sleep problems and other disorders, such as eye health and mental health. The problems then impact social interaction over time. The result supported the previous research by Witarsa et al. (2018), Munisa (2020), and Afdalia & Gani (2023) that indicated the correlation between gadget use and the children's social development aspects

From the results of research conducted in Tlogowungu Village, Kaloran Sub-district, Temanggung Regency, the majority of young children used gadgets in the form of smartphones for entertainment. Most children utilized gadgets to play games or YouTube, and some used the TikTok application. They usually used gadgets for an hour, and some even had no restrictions on their use without parental assistance. At an early age, children should be accompanied when using gadgets. As previously written, children aged 2– 4 years have a maximum screen time of an hour per day (Nurhamida et al., 2023). This is reinforced by the fact that, based on the American Optometric Association (Oktafia et al., 2021), excessive use is when children over two years old use gadgets for more than two hours a day, which can cause damage to the child's eyes because the gadget screen emits light, which is called high energy visible or commonly known as blue light. In addition, it can cause the risk of problems, such as computer vision syndrome, i.e., a symptom that arises because the eyes focus too much on the layer, resulting in an uncomfortable feeling if done for too long a period (Putri et al., 2022). Also, prolonged use of gadgets can cause farsightedness (myopia).

This result suggested that parents and teachers should be aware of the gadget use of their children. Gadget is a small technological object (tool or electronic item) with a special function but is often associated with an innovation or a new item (Saputri & Pambudi, 2018). Sophisticated goods created with various applications can provide news media, social networks, hobbies, and entertainment. It cannot be denied that using gadgets, both directly and indirectly, has positive and negative impacts. The impact is not limited to certain groups but has spread to all groups, both young and old, both educated circles, especially students. So the impact should be the consideration of using gadgets at an early age.

The social interaction of students with gadgets is also one of the considerations in managing the use and mitigation of the negative impact variable. Social interactions are social relationships that involve relationships between individuals, individuals and groups, and groups and groups (Viandari & Susilawati, 2019). The actions of an individual can influence other individuals in the social environment. In acting or behaving socially, a person should consider the existence of other individuals in their environment. Interaction is important and can be maintained to change behavior, meaning, and language. In other words, through interaction, someone can quickly and easily find out about something they want (Fahri & Qusyairi, 2019). The importance of boosting social interaction in children's development should make the teacher and parents aware of the correlation between gadget use and social interaction.

Furthermore, the continuous use of gadgets makes it difficult for children to interact face to face because it is more fun playing with gadgets than playing with their friends and socializing with the surrounding environment (Fitriyani & Barokah, 2021;

Kumulloh & Nurhafizah, 2022). Due to parents' lack of knowledge regarding gadgets, which affect social interactions, it is difficult for children to stop using gadgets. One way to reduce the impact of gadget use is by providing parenting to parents (Viandari & Susilawati, 2019) so they can limit time, supervise children when using gadgets, and invite children to play together (Adwiah & Diana, 2023).

CONCLUSION

Based on the research results analysis, it can be concluded that gadgets influence the social interaction development of children aged 5-6 years in Tlogowungu Village, Kaloran Sub-district, Temanggung Regency. This could be proven by a sig value of 0.000 <0.05 of the correlation. The result indicated that the negative correlation means that the higher gadget use intensity, the lower social interaction will exist. This study should be the basis for teachers and parents to mitigate the negative impact of gadget use from an early age.

REFERENCES

Adwiah, A. R., & Diana, R. R. (2023). Strategi orang tua dalam mengatasi dampak penggunaan gadget terhadap perkembangan sosial anak usia dini. *Jurnal Obsesi : Jurnal Pendidikan Anak Usia Dini*, *7*(2), 2463–2473.

Afdalia, A. P., & Gani, I. (2023). Dampak pengaruh gadget terhadap interaksi sosial anak usia dini. *Al-Irsyad Al-Nafs: Jurnal Bimbingan dan Penyuluhan Islam*, *10*(1), 87–96.

Cesilia, C., Wulandari, D. A., & Dhamayanti, M. (2022). Validitas dan reliabilitas Ages & Stages Questionnaire: Social-Emotional 2 versi Indonesia. *Sari Pediatri*, *22*(6), 343–350.

Chen, W., & Adler, J. L. (2019). Assessment of screen exposure in young children, 1997 to 2014. *JAMA Pediatrics*, *173*(4), 391–393.

Fahri, L. M., & Qusyairi, L. A. H. (2019). Interaksi sosial dalam proses pembelajaran. *PALAPA: Jurnal Studi Keislaman dan Ilmu Pendidikan*, *7*(1), 149–166.

Fitriyani, F. & Barokah, A. (2021). Language and socio-emotional development of children with speech delays: Analysis of gadget use. *EduBasic Journal: Jurnal Pendidikan Dasar*, *3*(1), 89–96.

Genc, Z. (2014). Parents' perceptions about the mobile technology use of preschool aged children. *Procedia - Social and Behavioral Sciences*, *146*, 55–60.

Hartati, S., Rachmawaty, M., Rachmat, I. F. & Maryani, I. (2023). The effect of smartphone addiction in early childhood towards emotional development : A correlational study. *Asia-Pacific Journal of Research in Early Childhood Education*, *17*(1), 49–66.

Jang, J., & Jeong, I. (2015). Related factors of smartphone addiction among preschool children. *The Journal of Korean Society for School & Community Health Education*, *16*(1), 65–81.

Khairi, H. (2018). Karakteristik perkembangan anak usia dini dari 0-6 tahun. *Jurnal Warna*, *2*(2), 15–28.

Kumulloh, Y., & Nurhafizah, N. (2022). Impact of gadget use on emotional development children aged 5-6 years in Khairunnisa kindergarten. *EduBasic Journal: Jurnal Pendidikan Dasar*, *4*(1), 85–96.

Mayenti, F., & Sunita, I. (2018). Dampak penggunaan gadget terhadap perkembangan anak usia dini di PAUD dan TK Taruna Islam Pekanbaru. *Phonton: Jurnal Sain dan Kesehatan* *9*(1), 208–213.

McCloskey, M., Johnson, S. L., Benz, C., Thompson, D. A., Chamberlin, B., Clark, L., & Bellows, L. L. (2018). Parent perceptions of mobile device use among preschool-aged children in rural head start centers. *Journal of Nutrition Education and Behavior, 50*(1), 83–87.

Munisa, M. (2020). Pengaruh penggunaan gadget terhadap interaksi sosial anak usia dini di TK Panca Budi Medan. *Jurnal Ilmiah Abdi Ilmu, 13*(1), 102–114.

Nurhamida, N., Marhun, M., & Inten, D. N. (2023). Studi deskriptif penerapan screen time terhadap aspek perkembangan anak usia dini. *Jurnal Riset Pendidikan Guru PAUD (JRPGP), 3*(1), 55–62.

Nurliana, N., & Aini, N. (2021). Dampak gadget terhadap komunikasi orang tua dan anak dalam keluarga di TK Negeri Pembina Kecamatan Lut Tawar. *Jurnal As-Salam, 5(*1), 101–109.

Oktafia, D. P., Triana, N. Y., & Suryani, R. L. (2021). Durasi penggunaan gadget terhadap personal sosial pada anak usia prasekolah: Literatur review. *Borneo Nursing Journal (BNJ), 4*(1), 31–47.

Oktaviana, A. (2021). Dampak penggunaan gadget terhadap interaksi sosial anak usia dini perspektif hadis. *Journal of Islamic Early Childhood Education, 4*(2), 145–153.

Pebriana, P. H. (2017). Analisis penggunaan gadget terhadap kemampuan interaksi sosial. *Jurnal Obsesi: Jurnal Pendidikan Anak Usia Dini, 1*(1), 1–11.

Prastiwi, M. H. (2019). Pertumbuhan dan perkembangan anak usia 3-6 tahun. *Jurnal Ilmiah Kesehatan Sandi Husada, 8*(2), 242–249.

Putri, L. A., Nikmah, N., Munisah, M., Hanum, D. F., Maharja, R., Rachmawati, A., Handajani, D. O., Indriani, H., & Rosita, R. (2022). Risk factors of smartphone addiction on pre-school children in Indonesia: Path analysis. *Jurnal Ilmiah Obsgyn, 14*(1), 59–70.

Retalia, R. (2020). Dampak intensitas penggunaan smarphone terhadap interaksi sosial. *EduPsyCouns: Journal of Education, Psychology and Counseling, 2*(2), 45–56.

Saputri, A. D., & Pambudi, D. A. (2018). Dampak penggunaan gadget terhadap kemampuan intraksi sosial anak usia dini. *Proceedings of The 3rd Annual Conference on Islamic Early Childhood Education, 3*(1), 265–278.

Sowmya, A. S. L., & Manjuvani, E. (2019). Usage of electronic gadgets among preschool children. *International Journal of Home Science, 5*(2), 1–5.

Susilowati, I. H., Nugraha, S., Alimoeso, S., & Hasiholan, B. P. (2021). Screen time for preschool children : Learning from home during the COVID-19 pandemic. *Global Pediatric Health, 8,* 1–6.

Talango, S. R. (2020). Konsep perkembangan anak usia dini. *Early Childhood Islamic Education Journal, 1*(1), 93–107.

Utami, U. R., & Alifah, S. N. (2022). Penggunaan gadget dalam pembelajaran dan perkembangan anak usia dini: Literature review. *Jurnal Manajemen Mutu Pendidikan, 10*(2), 38–51.

Viandari, K. D., & Susilawati, K. P. A. (2019). Peran pola asuh orangtua dan penggunaan gadget terhadap interaksi sosial anak prasekolah. *Jurnal Psikologi Udayana, 6*(1), 76–87.

Witarsa, R., Hadi, R. S. M., Nurhananik, N., & Haerani, N. R. (2018). Pengaruh penggunaan gadget terhadap kemampuan interaksi sosial siswa sekolah dasar. *PEDAGOGIK: Jurnal Pendidikan Guru Sekolah Dasar, 6*(1), 9–20.

Yuniarnia, D., & Surjaningrum, E. R. (2023). Parental perception about children's mobile usage. *Proceedings of The 1st International Conference on Indigenous Psychology & Culture (ICIPC), 1*(1), 206–220.