

Development of Traditional Game Media for Social Skills of Early Childhood with Special Needs

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Article History: Received: 24-08-2025, Revised: 26-09-2025, Accepted: 27-09-2025, Published: 30-09-2025

Abstract

Traditional games can be used as a learning program in schools, especially in building the character of early childhood because they bring many benefits from various aspects of early childhood development, ranging from character development, morals, multiple intelligences, cognitive, socio-emotional, physical-motor, and many more. This study is about the development of traditional game media, namely *Engklek*, in improving social skills for early childhood with special needs in inclusive schools; namely describing the development of traditional games for early childhood with special needs in inclusive schools, and its influence on social skills for early childhood with special needs in inclusive schools. The method used is Research and Development (R&D) using the Borg & Gall, 1983 model to develop and validate educational products consisting of ten steps in RA and KB Al-Jihad Malang, Indonesia. Research results: the development of *Engklek* accompanied by picture cards is needed for early childhood with special needs in inclusive schools. The influence of *Engklek* on the social skills of early childhood with special needs in inclusive schools is significant, the significance is $0.001 > 0.05$.

Keywords:

early childhood; engklek; social skills; traditional games

Abstrak

Abstrak Permainan tradisional dapat digunakan sebagai program pembelajaran di sekolah, khususnya dalam membentuk karakter anak usia dini karena membawa banyak manfaat dari berbagai aspek perkembangan anak, mulai dari pengembangan karakter, moral, kecerdasan majemuk, kognitif, sosio-emosional, fisik-motorik, dan banyak lagi. Penelitian ini membahas pengembangan media permainan tradisional *Engklek* dalam meningkatkan keterampilan sosial anak usia dini berkebutuhan khusus di sekolah inklusi; yaitu mendeskripsikan pengembangan permainan tradisional untuk anak usia dini berkebutuhan khusus di sekolah inklusi, serta pengaruhnya terhadap keterampilan sosial anak usia dini berkebutuhan khusus di sekolah inklusi. Metode yang digunakan adalah Research and Development (R&D) dengan model Borg & Gall (1983) untuk mengembangkan dan memvalidasi produk pendidikan yang terdiri dari sepuluh langkah, dilakukan di RA dan KB Al-Jihad Malang, Indonesia. Hasil penelitian menunjukkan bahwa pengembangan *Engklek* yang dilengkapi dengan kartu gambar dibutuhkan oleh anak usia dini berkebutuhan khusus di sekolah inklusi. Pengaruh *Engklek* terhadap keterampilan sosial anak usia dini berkebutuhan khusus di sekolah inklusi terbukti signifikan, dengan nilai signifikansi $0,001 < 0,05$.

Kata Kunci:

anak usia dini; engklek; keterampilan sosial, permainan tradisional



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Introduction

In recent years, the number of children with special needs in Indonesia has continued to increase, reaching around 3.3% of the population aged 5–17 years, or approximately 2,197,833 individuals, including early childhood (Tim Schoolmedia, 2022). Many of these children are enrolled in regular schools—kindergartens, Raudhatul Athfal, and equivalent institutions—rather than in Special Schools (SLB), thereby highlighting the growing importance of inclusive education (Hamilton, 2013). While inclusive settings provide valuable opportunities for children with special needs to adapt and socialize, they also face significant challenges in achieving optimal growth and development (Lewis & Norwich, 2007). One of the most pressing issues is their socio-emotional development, particularly in building social skills such as communication, cooperation, and adaptation (Benson & Haith, 2010; Kucuker & Cifci Tekinarslan, 2015; Himawan et al., n.d.). This problem is further exacerbated by the excessive use of gadgets among young children, with surveys showing that 98% of children aged 3–8 years in Southeast Asia already use gadgets, often replacing time that could have been spent playing with peers (Fauzi, 2020). Consequently, effective educational media to foster social interaction and skills in inclusive early childhood settings remain limited and urgently needed.

Previous studies have shown that traditional games can serve as an effective pedagogical tool in early childhood education. For example, they have been proven to support character building (Aisyah, 2017), enhance visual-spatial abilities (Saputra & Ekawati, 2021), and even foster entrepreneurial skills from an early age (Jufri & Wirawan, 2018). Some researchs also shows that traditional games, like *Oray-orayan* (Nurhayati & Rumsari, 2020), *Babancakan* (Handayani, 2018), hide and seek (Sartinah & Purnamasari, 2019), significantly enhance social skills in early childhood, including for children with special needs (Crepaldi et al., 2024). Internationally, traditional games are also integrated into school programs; Yekple et al. (2021), for instance, demonstrated that the Ghanaian traditional game *Ewe* improved literacy and numeracy among school-age children. These findings suggest that traditional games are beneficial for multiple aspects of child development, including cognitive, socio-emotional, moral, and physical-motor growth. However, despite this growing body of literature, there remains a notable gap: few studies have specifically investigated the use of *engklek* (hopscotch), a traditional Indonesian game, as a medium to improve the social skills of young children with special needs in inclusive schools. Addressing this gap is critical because such research would directly connect the cultural relevance of traditional games with the specific challenges of inclusive education in Indonesia.

This study adopts the Social Skills Improvement System (SSIS) developed by Gresham and Elliott (2008) as its main theoretical framework, focusing on three essential indicators of social competence: cooperation, communication, and participation. The SSIS framework provides a comprehensive structure for assessing

how educational interventions influence children's ability to engage in meaningful social interactions. In addition, the study is also informed by Parten's theory of play (Larsen, 2015), which categorizes games into solitary, parallel, associative, and cooperative forms. This dual theoretical foundation allows for a deeper understanding of how traditional games like *engklek* can be strategically designed to stimulate interaction and collaboration among children with special needs in inclusive educational settings.

The present study aims to develop and implement a learning medium based on the traditional Indonesian game *engklek* (hopscotch) in order to enhance the social skills of young children with special needs in inclusive schools. Specifically, the research focuses on how playing *engklek* can improve cooperation, communication, and participation among these children, as measured through the Social Skills Improvement System (SSIS). By situating *engklek* within an inclusive learning environment, this study seeks to provide an innovative and culturally relevant approach to fostering socio-emotional competencies in early childhood education.

This research is urgent for two main reasons. First, traditional games, as part of Indonesia's cultural heritage, are increasingly being abandoned in the face of rapid technological development and the dominance of digital gadgets in children's daily lives. Revitalizing *engklek* not only preserves local wisdom but also offers an engaging and low-cost pedagogical tool to counterbalance the socio-emotional challenges caused by excessive gadget use. Second, the study directly supports the national agenda of the Independent Curriculum, which emphasizes inclusive education and the holistic development of all learners, including those with special needs. By integrating cultural heritage into inclusive classroom practices, this research contributes both to the improvement of children's social skills and to the realization of equitable, character-based education in Indonesia.

Methods

This research uses a type of research and development or what is commonly known as Research and Development (R&D) model (Borg & Gall, 1983) to develop and validate educational products consisting of ten steps. The development contained in this study is the creation of *Engklek* game media to train social skills for early childhood with special needs in inclusive schools. The stages passed in this R&D are as follows:

- a. Pre-research and data collection (pre-research and collecting information); collection of initial needs analysis data on *Engklek* media to improve social skills for early childhood with special needs in accordance with the Social Skills Improvement System (SSIS) based on initial interviews, initial observations, and documentation and literature reviews related to the need for relevant learning media, especially those that can improve social skills for early childhood with special needs;
- b. Planning, namely the preparation of a research design including research topics, skills needed in the research, formulation of objectives and desired benefits, and an outline of the research design;
- c. Product development (develop preliminary form of product), including learning media materials, learning media development processes, and evaluation

- instruments; 4. Preliminary field testing, namely field trials in 1-3 schools that meet the criteria;
- d. Revision of initial trial results (main product revision), namely improving and minimizing the results of the initial trial;
- e. Main field testing, namely conducting a wider trial;
- f. Refinement of the main trial product results (operational product revision), is an activity to improve the media after being evaluated from the results of the initial and main trials;
- g. Operational field testing, namely the actual trial, collecting the necessary data, and making comparisons;
- h. Refinement of the final product (final product revision), namely the activity to improve the media after being evaluated from the initial trial, main trial, and operational field test;
- i. Dissemination and implementation, namely the application of the results of product development.

Collecting various types of data certainly requires instruments as tools so that the data obtained is easier and more organized. The following is a classification of data collection instruments based on their needs:

Table 1. Data Collection Instruments

No	Research Stage	Data Analysis	Responden	Instrument	Description
1.	Pre-Development	Qualitative data	Students and Teachers in Class B	Observation instruments and interview guidelines	Producing initial data on the need for traditional game media while analyzing the problems that exist in the institution.
2.	Post Development	Qualitative data	Expert validator	Notes in the form of criticism, suggestions and input	Description of the validity of traditional game media
		Quantitative data	Student	Evaluation questionnaire (assessment)	Level of media effectiveness

Source: Developed by the researcher (2025), adapted from Gresham & Elliott (2008) and Parten (1932).

In developing the *Engklek* media, the researcher used qualitative and quantitative data analysis techniques in the form of percentages with the following description:

1. Qualitative data was obtained from criticism, suggestions, and input submitted by media expert validators, material/development experts, and expert practitioners (teachers) in order to revise the media design. Qualitative data also contains observation results, which are supported by documentation results.
2. Quantitative data in the form of percentages obtained from instruments submitted to expert validators related to media validity tests and their

relevance to the development of social skills referring to the Social Skills Improvement System (SSIS).

Qualitative data obtained from validation by media experts, learning material experts, and also practitioners (teachers) will be processed using the formula below:

$$P = \frac{f}{N} \times 100\%$$

Data in the form of percentages will then be processed and described based on the criteria for media eligibility that have been set in the research instrument. As for the data in the form of percentages, conclusions will be drawn based on the percentage category by (Arikunto, 1983) as a determinant of whether the development of traditional game media being studied is included in the category of feasible or not yet feasible for use. The following is the percentage classification:

1. Analysis of Student Responses to the Interest of *Engklek* Media

The student response questionnaire was used as a tool to measure the level of interest of the *Engklek* media. The data from the student responses were analyzed using the validation result analysis formula:

$$P = \frac{\sum x}{\sum xi} \times 100 \%$$

2. Analysis of the Influence of Using *Engklek* Media

The data obtained from the results of the pretest and posttest assessments were used to determine the level of comparison between before and after using *Engklek* media. At the data analysis stage, the paired sample t-test or uj-t formula was used because the data was obtained from the same subject with two different means/averages. To avoid errors in the t-test analysis, the researcher used the SPSS 16.0 application with the formula:

$$t = \frac{\sum D}{\sqrt{\frac{(N \sum D^2 - (\sum D)^2)}{N - 1}}}$$

Results and Discussion

Results

Analysis of Needs for *Engklek* Game Media in Schools

Based on the analysis of needs for traditional games that focus on the social skills of children with special needs in inclusive schools, it was found that the schools, namely RA and KB Al-Jihad Malang, have children with special needs diagnosed with ADHD. In these schools, they have never implemented and never had *Engklek* media that is printed or packaged in a modern way so that it can be used at any time. The selection of *Engklek* media is based on the needs and suitability of the child's age and development stages. By looking at these reasons, the researcher decided to follow up by developing and researching *Engklek* media in several schools.

Development of *Engklek* Game Media Products

Traditional games in the form of *Engklek* media are games that originate from Java. The *Engklek* game is played by jumping with one foot on a flat surface that has been attractively designed, then printed on a Flexy Banner. The *Engklek* media

developed consists of the main image of *Engklek*, picture cards or flash cards, ‘gacuk/gacoan’ as a sign of ownership and a media usage guidebook. The following is an explanation of each part of the *Engklek* media that has been developed with a focus on children’s social skills, namely: cooperation, communication and responsibility. The following is a design for *Engklek* media that has been developed and printed on a Flexy banner with a width of 1.5 and 2 meters.

1. The *Engklek* Board

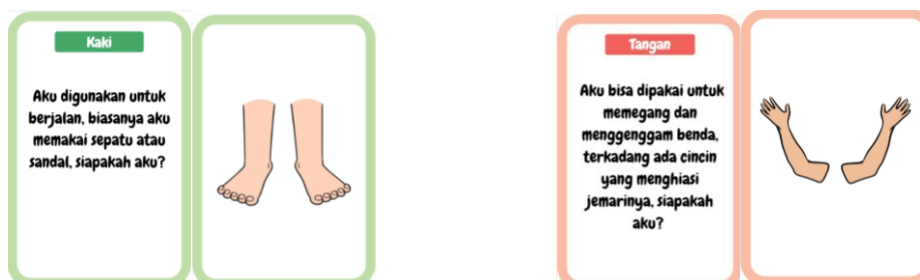


Figure 1. *Engklek* Board
Source: Research data, 2025

The *Engklek* board media is designed with the words “Let’s Play Engklek” accompanied by colorful pictures so that it is attractive to children. The pictures on the *Engklek* board media are an introduction to body parts for children aged 4-6 years. The other part contains pictures of little boys and girls, as well as pictures of hot air balloons.

2. Picture Card Design

The following is a design of a flash card/picture card as a companion to the *Engklek* media that can be used for the process of playing *Engklek*. On each picture card, there is a picture of a body part according to the same picture on the *Engklek* media. The other side of the picture card contains a sentence of instructions to say according to the name of the picture on the other side.



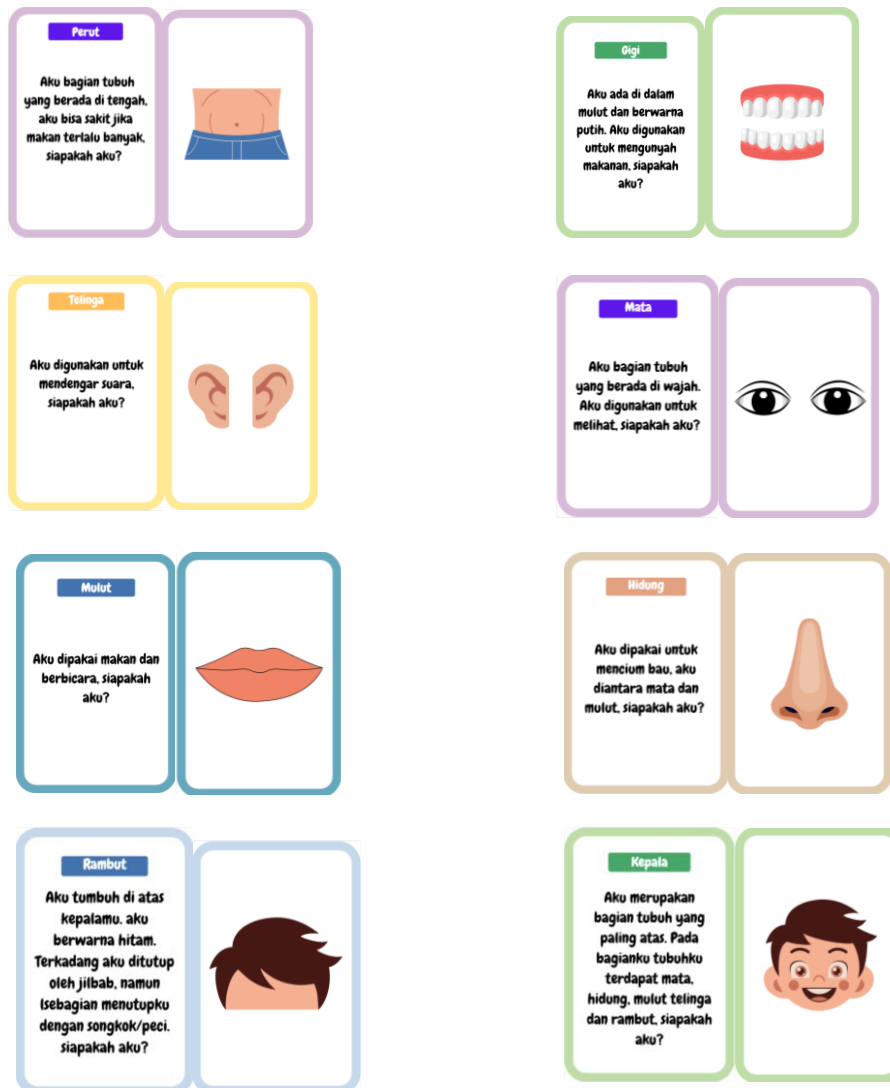


Figure 2. Design of Engklek
Source: Research data, 2025

Engklek media is equipped with picture cards that are designed attractively and colorfully and cartoon images that are easily identified by children on 7*10 cm paper. The existence of the cards aims to introduce body parts to children aged 4-5 years. The picture cards are accompanied by instructions that can be delivered or used as a quiz by the teacher during the game process. In addition, children can discuss with their peers when they want to answer the instructions given.

3. 'Gacuk' Design

The following is a *gacuk* design on the *Engklek* or hopscotch media for children's social skills.



Figure 3. *Gacuk/Gaco*
Source: Research data, 2025

Gacuk is made from green, red and yellow flannel fabric with the edges sewn to make it neater and then filled with sand so that it has a load that is easier to fit into the box on the *Engklek* media. The size of the *gacuk* is 7*7 cm to make it easier for children to hold or when thrown onto the *Engklek* board.

4. How to Play *Engklek* Game Media?

The following are the steps that teachers must take before or when playing with *Engklek* media. Among them are:

a. Teacher Activities

- 1) Prepare an open space, *Engklek* board and picture cards
- 2) Introduce *Engklek* media and practice how to use it to children
- 3) Before or after jumping on the *Engklek* board, the teacher reads the picture cards to stimulate children's readiness in the activity.
- 4) Guide and motivate children when using *Engklek* media
- 5) Evaluate play activities by looking at the achievement of learning objectives.

b. Children's activities

- 1) Children sit around the *Engklek* board media, starting and ending activities with prayer.
- 2) The game can be played individually by trying to jump on the *Engklek* board according to the teacher's instructions.
- 3) Children read picture cards to ask their peers.

Expert Validation Data

After completing the media design stage, the next step is expert validation. This process aims to measure the validity level of the *Engklek* media, which was assessed by three types of experts: media experts, child development experts, and practitioner experts. In addition, the researchers also collected group test scores during the research process. Group tests were carried out after obtaining expert validation results.

1. Media Expert Validation

Validation from media experts was carried out to evaluate the technical aspects of the *Engklek* game media. The assessment focused on durability, safety, design quality, material availability, and visual appeal. These aspects are important to ensure that the media can be effectively implemented in learning activities and

used repeatedly without significant damage. The results of this validation are presented in table 2.

Table 2. Media Expert Validation

No	Statement	Score	Max Score	Eligibility Level
1	<i>Engklek</i> media has durable material	5	5	Very good
2	<i>Engklek</i> media is safe for children	5	5	Very good
3	The size of the <i>Engklek</i> banner is suitable for children aged 5-6 years	5	5	Very good
4	The 'gaco' size is suitable for children aged 5-6 years	4	5	Good
5	<i>Engklek</i> media is made from materials that are easily found in the surrounding environment	4	5	Good
6	<i>Engklek</i> media has an attractive design	4	5	Good
7	The illustrations on the <i>Engklek</i> media and the picture cards are interesting	4	5	Good
8	The illustrations on the <i>Engklek</i> game and cards contain material to introduce children to body parts	5	5	Very good
9	The color combination on the <i>Engklek</i> is harmonious and attractive	4	5	Good
10	Designed to suit the social skills of 5–6-year-olds	4	5	Good
11	<i>Engklek</i> media can develop the social skills of 5–6-year-old children in the form of the ability to adapt to situations (individual/group play)	4	5	Good
12	<i>Engklek</i> media can be used anywhere (indoors or outdoors)	5	5	Very good
13	<i>Engklek</i> media can be used at any time	5	5	Very good
14	Easy companion in introducing body parts	5	5	Very good
Total			68	75

Source: Research data, 2025

Based on the media expert validation results, the feasibility percentage was calculated as:

$$P = 68/75 \times 100\% = 90.7\%$$

The validation score reached 90.7%, this score indicates that the *Engklek* media is categorized as highly feasible, suitable for research use, and ready for implementation in testing. Qualitative input suggested that the *Engklek* media should include a 'gaco' made from materials that are easier for children to hold.

2. Child Development Expert Validation

Validation by child development experts aimed to assess the suitability of the *Engklek* media with the developmental characteristics of children aged 5–6 years. The evaluation covered elements such as appropriateness to children’s needs, learning objectives, illustration relevance, and the potential to foster social, emotional, and cognitive skills. Table 3 displays the data from the child development expert validation.

Table 3. Child Development Expert Validation

No	Statement	Score	Max Score	Eligibility Level
1	<i>Engklek</i> media helps children demonstrate conversations with friends	5	5	Very good
2	<i>Engklek</i> media according to children’s needs	4	5	Good
3	The material on the <i>Engklek</i> and picture cards is in accordance with the learning objectives (introducing body parts)	5	5	Very good
4	<i>Engklek</i> media triggers interest in its use	5	5	Very good
5	Illustration of the picture on <i>Engklek</i> according to the development of children aged 5-6 years	4	5	Good
6	The illustrations on the picture cards are interesting for children	5	5	Very good
7	Children can easily understand the contents of the <i>Engklek</i> picture card material	5	5	Very good
8	Easy companion in introducing body parts	5	5	Very good
9	<i>Engklek</i> media can trigger children’s desire to play with friends	5	5	Very good
10	<i>Engklek</i> media can help children learn how to solve simple problems	4	5	Good
11	<i>Engklek</i> media can foster an attitude of sharing with friends	4	5	Good
12	<i>Engklek</i> media can help children express emotions that are appropriate to existing conditions (happy - sad - enthusiastic, etc)	5	5	Very good
13	<i>Engklek</i> media can help children learn manners and politeness according to local socio-cultural values	5	5	Very good
14	Children are interested in completing the game	5	5	Very good
15	Children want to tidy up their play equipment by themselves or with their friends	5	5	Very good
Total		71	75	

Source: Research data, 2025

Based on the child development expert validation results, the feasibility percentage was calculated as: $P = 71/75 \times 100\% = 94.7\%$. The validation score reached 94.7%, indicating that the *Engklek* media is suitable for research use.

3. Expert Practitioner Validation

Validation from expert practitioners was conducted to examine the practicality of using the *Engklek* media in real learning settings. The evaluation included ease of use, safety, attractiveness for children, and effectiveness in

supporting teaching practices. The results of this practitioner validation are shown in table 4.

Table 4. Expert Practitioner Validation

No	Statement	Score	Max Score	Eligibility Level
1	<i>Engklek</i> media can be used to introduce body parts to children aged 5-6 years.	5	5	Very good
2	The illustrations on the <i>Engklek</i> and picture cards are presented in an attractive way	4	5	Good
3	Illustration of the image according to the age stage of children aged 5-6 years	5	5	Very good
4	The color combination used in the <i>Engklek</i> media is interesting	5	5	Very good
5	<i>Engklek</i> media is safe for children	4	5	Good
6	The size of the <i>Engklek</i> media drives children's desire to cooperate	5	5	Very good
7	<i>Engklek</i> media can trigger children's desire to play and talk with peers	5	5	Very good
8	<i>Engklek</i> media can help children learn how to solve simple problems	4	5	Good
9	<i>Engklek</i> media can foster an attitude of sharing with friends	4	5	Good
10	<i>Engklek</i> media can teach honesty and patience when queuing	4	5	Good
11	<i>Engklek</i> media can help children express emotions that are appropriate to existing conditions (happy - sad - enthusiastic, etc)	5	5	Very good
12	Children enjoy doing activities using the <i>Engklek</i> media	5	5	Very good
13	It is easy for teachers/assistants to convey the material on introducing body parts using the <i>Engklek</i> media	4	5	Good
Total		59	65	

Source: Research data, 2025

Based on the expert practitioner validation results, the feasibility percentage was calculated as: $P = 59/65 \times 100\% = 90.77\%$. The results of the validation measurement of the *Engklek* media were 90.77%, so it can be interpreted that the *Engklek* media is suitable for research use.

Prerequisite Test Data

Based on the normality and homogeneity tests in research using one class, the prerequisite test needed is only the normality test. The normality test was analyzed using the Kolmogorov-Smirnov analysis with SPSS. The complete results of the normality test with SPSS can be seen in Figure 13 as follows.

Descriptive Statistics						
	N	Minimum	Maximum	Mean		Std. Deviation
	Statistic	Statistic	Statistic	Statistic	Std. Error	Statistic
PRE TEST	19	20.00	48.00	40.6316	1.90906	8.32139
POST TEST	19	40.00	60.00	55.6316	1.21446	5.29371
Valid N (listwise)	19					

One-Sample Kolmogorov-Smirnov Test			
		Unstandardized Residual	
N		19	
Normal Parameters ^{a,b}	Mean	.0000000	
	Std. Deviation	1.4772833	
Most Extreme Differences	Absolute	.220	
	Positive	.220	
	Negative	-.171	
Test Statistic		.220	
Asymp. Sig. (2-tailed) ^c		.016	
Monte Carlo Sig. (2-tailed) ^d	Sig.	.014	
	99% Confidence Interval	Lower Bound	.011
		Upper Bound	.017

Figure 4. Normality Test
Source: Research data, 2025

Based on the results of the normality test using the Kologorov Smirnov method with the help of SPSS, it can be seen that the sig value is $0.014 > 0.05$ so that it can be concluded that the data is normally distributed. Because the data is normally distributed, the hypothesis test can use parametric statistics, namely using the paired sample t-test.

Hypothesis Testing

The hypothesis test of this study was analyzed using the paired sample t-test. Because this study uses the same class as the pretest and posttest tests. The complete results of the paired sample t-test can be seen below.

Paired Samples Statistics					
		Mean	N	Std. Deviation	Std. Error Mean
Pair 1	PRE TEST	40.6316	19	8.32139	1.90906
	POST TEST	55.6316	19	5.29371	1.21446

Paired Samples Correlations					
		N	Correlation	Significance	
				One-Sided p	Two-Sided p
Pair 1	PRE TEST & POST TEST	19	.960	<.001	<.001

Paired Samples Test										
		Paired Differences				t	df	Significance		
		Mean	Std. Deviation	Std. Error Mean	95% Confidence Interval of the Difference			One-Sided p	Two-Sided p	
					Lower	Upper				
Pair 1	PRE TEST - POST TEST	-15.00000	3.55903	.81650	-16.71540	-13.28460	-18.371	18	<.001	<.001

Figure 5. Paired Sample Test Results
Source: Research data, 2025

Based on table 4.14, it is known that the significance is $0.001 > 0.05$, so it is concluded that there is a difference between the pretest and posttest data. Based on the average value, it can be concluded that the average pretest value $<$ the average posttest value. So it can be concluded that *Engklek* media has an effect on the social development of children with special needs and all children in general.

Discussion

The product that has been developed in the form of traditional *Engklek* game media is aimed at children's social skills. The indicators intended in the social skills of children without special needs and children with special needs in using *Engklek* media include: cooperation skills, communication and responsibility (Rusli et al., 2024). Kholidah & Sari (2023) said that the use of *Engklek* facilitates the learning process while playing so that children are interested and can overcome boredom while learning especially in activities to introduce body parts.



Figure 6. Child Guessing Clue Sentences
Source: Research data, 2025

Based on the results of media development, it was found that the *Engklek* media is valid so that it is very suitable for use to improve children's social skills. Not only does it improve the ability of interaction between players (Kurniawan et al., 2017; Kim et al., 2023; Revita, 2021), the *Engklek* that requires children to play it by jumping on squares can stimulate children's motor development (Hasyim & Putri, 2018; Lestari & Ardianingsih, 2017; Olykaynen, 2016).

Research and development of traditional games in the form of *Engklek* media was carried out because there were special needs children with ADHD diagnoses at school and had never had *Engklek* media that was printed or packaged in a modern way so that it could be used at any time so that it had never implemented the activity, besides that it was also an effort to preserve Indonesian culture (Hasyim & Putri, 2018). The selection of *Engklek* media was based on the needs and suitability of the child's age and development stages.



Figure 7. Children Help Tidy Up Toys
Source: Research data, 2025

With fun games that help children optimize their development, in line with who explains that playing is a fun activity, whether done alone or more than two people with mutual agreement. Through *Engklek*, children can hone their acuity and balance when throwing stones or when jumping. In addition, children socialize with peers so that they foster joy and togetherness (Hasyim & Putri, 2018).



Figure 8. Child maintaining balance while playing *Engklek*
Source: Research data, 2025

The traditional game media, *Engklek*, is a modification of a learning aid developed to support learning activities while playing for early childhood. The aspects developed in this game focus on social skills based on the Social Skills Improvement System (SSIS), namely cooperation, communication, and

involvement. The specifications of the design of *Engklek* media that the researcher wants to develop are as follows:

- a. *Engklek* is an adaptation of a traditional game from the Javanese tribe which is modified as a learning that can improve social skills for early childhood with special needs;
- b. *Engklek* is designed with an attractive design, safe and durable materials, and is adjusted to the stages of development of early childhood based on the Child Development Achievement Level Standards (STPPA);
- c. The specifications of the design of *Engklek* are:
 - 1) The *Engklek* media is in the form of a flat plane pattern consisting of rectangles and semicircles arranged in such a way as to resemble the *Engklek* pattern in general;
 - 2) Each flat area contains a sequence number accompanied by a picture of a body part (feet, hands, stomach, teeth, ears, eyes, lips, nose, hair, and head). In other areas are decorated with colors and pictures that are attractive to children;
 - 3) The media is also equipped with a media usage guidebook and flash cards containing pictures that are easily recognized by children, so that later children can find objects that match the initial vowel letter listed on the *Engklek* field;
 - 4) The media is printed in large sizes so that it can be a comfortable play area for early childhood. The materials used in printing the media are flexy banners with a length of 1.5 m² and a width of 2 m²;
 - 5) The flash card media will be printed with 10x10 cm HVS paper which is laminated so that it is not easily torn and is waterproof; As for the picture cards of body parts for introduction to children
 - 6) The media can be played individually or in groups.

Conclusion

This study has demonstrated that the traditional game *Engklek* is not merely a recreational activity but a meaningful medium for enhancing children's social skills, particularly in the early childhood stage of 5-6 years. By integrating *Engklek* into structured learning settings, children were observed to develop cooperation, turn-taking, communication, and the ability to respect rules—key indicators of social competence. These findings indicate that traditional games can serve as effective pedagogical tools to address developmental needs that are often overlooked in more conventional, academically oriented approaches.

Beyond the immediate findings, the study suggests that *Engklek* offers educators and parents a culturally rooted, accessible, and cost-effective method for fostering social development in young learners. The implications extend to early childhood education curricula, where incorporating traditional play can balance cognitive and socio-emotional growth. Therefore, this research underscores the significance of revitalizing traditional games not only as heritage preservation but also as an innovative strategy to support holistic child development in contemporary educational contexts.

References

- Aisyah, E. N. (2017, September). Character building in early childhood through traditional games. In *3rd International Conference on Education and Training (ICET 2017)* (pp. 292-294). Atlantis Press. <https://doi.org/10.2991/icet-17.2017.51>.
- Arikunto, S. (1983). *Prosedur Penelitian: Suatu Pendekatan Praktik*. PT. Bina Aksara, Jakarta.
- Benson, J. B., & Haith, M. M. (2010). *Social and Emotional Development in Infancy and Early Childhood*. Academic Press.
- Borg, W. R., & Gall, M. D. (1983). *Educational Research: An Introduction*. Longman.
- Crepaldi, A. A. de S., Silva, M. A., Silva, E. M. D. M., Montes, K. S. D. C., & Barbosa, A. S. (2024). The Role of Games and Play in The Cognitive Development of Children with Disabilities. *IOSR Journal of Business and Management*, 26(10), 48–55. <https://doi.org/10.9790/487x-2610014855>.
- Fauzi, H. (2020). Pemanfaatan Teknologi Gadget terhadap Pengaruh Sosial Emosi AUD dalam Konsep Pembelajaran Literasi Digital. *Pedagogi: Jurnal Ilmu Pendidikan*, 20(1), 50-53. <https://doi.org/10.24036/pedagogi.v20i1.819>.
- Gresham, F. M., & Elliott, S. N. (2008). *Social Skills Improvement System—Rating Scales (SSIS-RS)*. APA PsycTests. <https://doi.org/10.1037/t02650-000>.
- Hamilton, A. (2013). *Missy Hamilnook Reflects: on Early Childhood Education*. Kathryn Harhai.
- Handayani, A. S. (2018). Peningkatan keterampilan sosial anak usia dini melalui permainan tradisional babancakan di pos PAUD Melati 03. 1(3), 66–75. <https://doi.org/10.22460/CERIA.V1I3.P66-75>.
- Hasyim, N., & Putri, A. B. U. (2018). Upaya Melestarikan Permainan Tradisional Engklek melalui Teknologi Digital Interaktif. *Jurnal Rupa*, 2(2), 122-137. <https://doi.org/10.25124/rupa.v2i2.1011>.
- Himawan, A., Matulesy, A., & Muhid, A. (n.d.). *Benefits of the Traditional Game of Gobak Sodor: Improving Communication Skills and Social in Early Childhood, Literature Review*. <https://doi.org/10.5220/0010809800003347>.
- Jufri, M., & Wirawan, H. (2018). Internalizing the spirit of entrepreneurship in early childhood education through traditional games. *Education + Training*, 60(7/8), 767–780. <https://doi.org/10.1108/ET-11-2016-0176>
- Kholidah, Z., & Sari, P. M. (2023). Development of Engklek Game Media Based on Higher Order Thinking Skills in Learning Science of Class V Elementary School. *Jurnal Penelitian Pendidikan IPA*, 9(8), 6181–6187. <https://doi.org/10.29303/jppipa.v9i8.4406>.
- Kim, B., Kim, Y. C., Son, J. J., Song, D. Y., Lee, I. J., Han, J. H., Kim, D., Yoo, H. J., & Kim, J.-I. (2023). Game-Driven Practices for Social Skills: Exploring Usability for Children with Autism Spectrum Disorder. In *Proceedings of the 2023 ACM Conference on Information Technology for Social Good* (pp. 504-509). <https://doi.org/10.1145/3582515.3609574>.

- Kucukera, S., & Cifci Tekinarslan, İ. (2015). Comparison of the Self-Concepts, Social Skills, Problem Behaviors, and Loneliness Levels of Students with Special Needs in Inclusive Classrooms. *Educational Sciences: Theory and Practice*, 15(6), 1559-1573. <https://doi.org/10.12738/estp.2015.6.2331>
- Kurniawan, R., Hasibuan, Y. H. G., Jalaputra, D. P. E., & Rakhmawati, R. (2017, August). FarmBit: Prototipe Pembelajaran Interaksi Sosial untuk Anak Autis Berbasis Game Multiplayer. In *Seminar Nasional Informatika Medis (SNIMed)* (pp. 42-48). <https://journal.uii.ac.id/snimed/article/view/8515/PDF%2008>.
- Larsen, L. J. (2015). Play and space – towards a formal definition of play. *International Journal of Play*, 4(2), 175–189. <https://doi.org/10.1080/21594937.2015.1060567>
- Lestari, S. (2017). Peningkatan Kemampuan Interaksi Sosial Melalui Permainan Tradisional Cublak-Cublak Suweng Pada Anak Autis Kelas Tiga di SLB. *Jurnal Pendidikan Khusus*, 9(2).
- Lewis, A., & Norwich, B. (2007). Special teaching for special children? Pedagogies for inclusion. *Educational and Child Psychology*, 24(3), 54–67. <https://doi.org/10.53841/bpsecp.2007.24.3.54>.
- Nurhayati, S., & Rumsari, C. (2019). Social Skill Development in The Game Oray-orayan Traditional Children of West Java. In *Proceeding ICONSEIR*, (pp 1-6). <https://doi.org/10.4108/EAI.17-12-2019.2295997>.
- Olykaynen, D. (2016). *Designing a Board Game for Children to Enhance Well-Being and Train Social Skills*. <https://www.theseus.fi/handle/10024/117029>.
- Revita, E. (2021). Pengembangan Media Pembelajaran dan Game Interaktif Bagi Anak Berkebutuhan Khusus. *Jurnal Edik Informatika Penelitian Bidang Komputer Sains dan Pendidikan Informatika*, 8(1), 53-60. <https://doi.org/10.22202/ei.2021.v8i1.5025>.
- Rusli, T. I., Cahaya, N., Idhayani, N., Amalia, W. O. S., & Sain, Y. (2024). Meningkatkan Kemampuan Sosial Anak TK Kelompok B Melalui Permainan Tradisional Kabadri-Kabadri. *Semantik Jurnal Riset Ilmu Pendidikan Bahasa Dan Budaya*, 2(2), 299–320. <https://doi.org/10.61132/semantik.v2i2.1006>.
- Saputra, N. E., & Ekawati, Y. N. (2021). Past and present: Improving early childhood visual spatial abilities through traditional game cengkling. *HUMANITAS: Indonesian Psychological Journal*, 18(1), 55-64. <https://doi.org/10.26555/humanitas.v18i1.16854>.
- Sartinah, E. P., & Purnamasari, H. (2019, December). Modified Traditional Hide and Seek Game to Improve the Social Skills of Students with Mild Intellectual Disability. In *3rd International Conference on Special Education (ICSE 2019)* (pp. 107-109). Atlantis Press. <https://doi.org/10.2991/assehr.k.250121.024>.
- Tim Schoolmedia. (2022). *Hak Pendidikan 2.3 Juta Anak Berkebutuhan Khusus Usia PAUD Dikdasmen Wajib Dipenuhi Negara*. School Media News.
- Yekple, S. L., Vinyo, I. Y., & Kumah, M. S. (2021). Developing literacy and numeracy in early childhood education in Ghana: The Role of Traditional

Ewe Play Games. *International Journal of Progressive Sciences and Technologies (IJPSAT)*, 215-226. <https://doi.org/10.52155/ijpsat.v25.1.2786>.

Yusran, E. R. (n.d.). *Pengembangan Media Pembelajaran Dan Game Interaktif Bagi Anak Berkebutuhan Khusus*.