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# Examination of pre-school teachers' opinions on mixed age groups in education

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# **ABSTRACT**

This research was conducted in order to determine the opinions of preschool teachers on education with a mixed age group in preschool education. In the research, the case study method, one of the qualitative research methods, was used in order to examine the opinions of the teachers in detail. The study group of the research consists of 12 pre-school teachers who were selected by the criterion sampling method, one of the purposive sampling methods, working in the schools affiliated to the Ministry of National Education in the Kirikhan District of Hatay Province and teaching in classes of mixed age groups. The data of the research were obtained with a semistructured interview form applied to pre-school teachers. As a result of the research, it was concluded that teaching in a mixed-age classroom gave teachers different perspectives on experiences and events, and that teachers had the most difficulty in preparing a joint education plan suitable for all age levels. Furthermore, in the research, it was concluded that receiving education with a mixed-age group supports the development of the students, gives responsibility to the older students, reinforces their knowledge, and gives exemplary behaviors to the younger students.

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#### 1. INTRODUCTION

The life of human beings consists of processes that begin with birth and continue throughout life, including combined cycles. The human being, who takes her/his place in life as a biological being that contains certain inherited and physical features that are not available at the beginning and emerges spontaneously, transforms into a psychological, biological and social being by including the features such as growth, development and maturation in the process [1]–[3]. In this process, human also shapes her/his transformation by making additions on the basic features that have already existed. It is known that in this process, positive behaviors and basic characteristics that emerge in humans are systematically acquired, and even the first cycle of change, coincides with the preschool period [4]–[6]. Therefore, pre-school education is of great importance in overcoming the personal change cycle that occurs in the pre-school period in a healthy way.

Pre-school education, which is an important part of education systems aiming to raise qualified generations in line with the needs of societies, covers the education of all children in the 0-6 age range [7], [8]. Although the needs of the country and society are the primary priorities in the education systems of countries, the main priority in pre-school education is the needs of the child [9]–[11] Thus, while the preschool education process is being designed and planned, the individual characteristics of the children are

taken into consideration as the main factor and the design processes are shaped according to the individual characteristics of the children [12], [13]. Based on the understanding that the child is unique, this planned process accepts that children have their own individual characteristics, and is also affected by various factors such as maturation, development, growth and readiness level peculiar to the child [14], [15].

The level of development of a child is one of the primary factors that differentiate a child from other children in preschool education [16], [17]. Development is a complex process that includes the concepts of maturation, which includes the hereditary characteristics of the child, and growth, which includes the quantitative advance of the child [18], [19]. During the preschool education period, children are expected to show the developmental characteristics suitable for their age, and the preschool education program is planned according to these expectations [20], [21]. For example, a 4-year-old child should be capable of holding the pencil correctly, while a 6-year-old child should be capable of using the pencil efficiently [22]. For this reason, in preschool education programs, each age group is considered separately according to its characteristics. The values, concepts and achievements that should be given according to the characteristics of each age group in the preschool education process are specially planned.

When we examine the pre-school education programs implemented throughout the world, it can seen that the age groups in the education program are mostly categorized in 3 different ways as 36-48 months, 48-60 months and 60-72 months [23]–[25]. In the categorical framework created, self-care skills, cognitive, social-emotional, motor and language development characteristics are determined according to children, and separate instructions for each age group are included in the program according to the features of the determined developmental areas [26], [27]. While these instructions consist of simple behaviors at the beginning, they become more complex as the age level increases. Therefore, in pre-school education, children are first provided with basic developmental features that will enable them to maintain their lives, while social skills and values are provided in the future [28], [29]. However, if one examines the studies in the literature, it can be seen that the education provided in the age group categorized in the pre-school period is insufficient in revealing the social skills of children and creating value concepts [30], [31]. Researchers have stated that such insufficiencies can only be eliminated in a mixed-age environment and with pre-school education [32], [33].

It is very important to carry out joint activities with all age groups, to prepare the program of preschool education and to plan the process for the lessons taught with mixed age groups in pre-school [34]. In pre-school education implemented with mixed age groups, it is aimed to boost the learning capability of young children by observing and imitating behaviors of older children, while older children gain a sense of responsibility and reinforce what they have learned while using teaching methods [35]. Thus, children in the mixed age group develop their empathy skills faster [36]. In addition, children in mixed age groups learn to share, respect each other's thoughts and behaviors and communicate more easily [37]. In some studies, it has been concluded that individual characteristics can be neglected and it can be difficult to control the education process when pre-school education is given to a group of children of different ages [38]–[40]. Considering all these opinions and research results, pre-school education programs implemented in countries should be developed in a way that is related to both categorized age groups and mixed age groups.

Today, pre-school education is designed as mixed age groups and non-mixed age groups and education programs are shaped in this context. Although we are aware of the importance of continuing the pre-school education process with children of their own age and other age groups, pre-school education is generally provided in mixed age groups. Therefore, some problems arise regarding the acquisition processes of the behaviors expected to emerge in children in pre-school education. Hence, it is very important to know what the problems are with the mixed age group in the pre-school education. In this context, the problem sentence of the research was determined as "what are the opinions of pre-school teachers on mixed-age groups in pre-school education." In addition, it was aimed to contribute to the research process by creating sub-problem sentences in the research: i) What are the benefits for the teacher of teaching in a mixed age group in pre-school education?; ii) What are the difficulties for the teacher of teaching in a mixed age group in pre-school education?; iii) What are the benefits of studying in a mixed age class in pre-school education for the student?; iv) What are the difficulties of studying in a mixed age group in pre-school education for the student?; v) What are the benefits of the mixed age group to the learning process in pre-school education?; vi) What are the difficulties of the mixed age group in the learning process in pre-school education?; and vii) How should the educational environment be arranged in a classroom with mixed age groups in pre-school education? The aim of this research is to determine the opinions of pre-school teachers about the education they provide to mixed age group in pre-school and to determine the contributions and difficulties of the education given to mixed age group in pre-school period to the teacher, student and learning process.

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#### 2. RESEARCH METHOD

#### 2.1. Research design

This research was carried out using the case study design, which is one of the qualitative research methods, in which the data obtained from the views of preschool teachers about the problem situations created by the researcher are "examined in detail and the themes related to the situation are described" [41]. Besides, during the interviews and meetings with the teachers in the research, the opinions of the teachers about the mixed age group in pre-school education were recorded and analyzed later, and a case study design was also used in the research in order to describe the subject in depth, based on both the interviews and the analyzes made.

# 2.2. Study group

The study group of the research consists of 12 pre-school teachers working in schools affiliated to the Ministry of National Education in Kirikhan district of Hatay province. While creating the study group in the research, among all pre-school teachers, the study group was formed by selecting only the pre-school teachers who teach mixed age group with the criterion sampling method, which is one of the purposeful sampling methods. While forming the study group, a volunteer agreement was signed with the pre-school teachers who would participate in the research within the framework of ethical rules. The names of the teachers included in the study group were kept confidential during the study and the teachers were coded as K1., K2., K3., K4., ...... K12.

#### 2.3. Collection of data

In the research, a semi-structured interview form was developed by the researcher and the research data were collected with this form in order to determine the opinions of the teachers about the education with mixed age group in pre-school education. While preparing the interview form, first of all, former researches and related literature on the subject were examined. In addition, expert opinions were used for the semistructured interview form, which would be used as a data collection tool in the research. First of all, a draft form was developed based on previous research and interviews with pre-school teachers, then the opinions of 3 assissant professor working on mixed age group in preschool education were received regarding the questions in the form, and the interview form and the questions in the form were corrected according to the feedback from the experts. Later, in order to eliminate the ambiguity regarding the questions, the questions in the form were revised with the help of 2 assissant professor working in Turkish teaching, and the questions in the form took their final form The semi-structured interview form created by the researcher was applied to pre-school teachers, so that data on the education provided by preschool teachers with mixed age groups were obtained. During the interviews with the teachers, the appropriate time period and the environment in which each teacher would like to conduct the interview were determined, and the answers given by the teachers to the interview questions during the interviews were recorded with a voice recorder. For the data collection process in the research, each teacher was interviewed for an average of 45 minutes. During these interviews, some teachers wanted to fill in the form developed for the research, and some teachers wanted a voice recording. In accordance with the wishes of the teachers, the wishes of each teacher were fulfilled. It took approximately 3 weeks to collect the research data.

# 2.4. Analysis of data

To analyze the data, firstly, audio data obtained from the participants related to the research problems were transferred to the computer. The codes were created in detail by the researcher, two teachers and two lecturers who are experts in the field of coding, using the content analysis method with the data transferred to the computer. Among the created codes, some codes were combined in the same code by reaching a consensus. The determined codes were also very effective in structuring the findings section of the research.

# 3. RESULTS

# 3.1. Findings related to sub-problem

In the interviews with the teachers, it was understood that the teachers expressed various opinions about the benefits of teaching in preschool with mixed age groups, such as providing peer education and facilitating teaching. In order to make these more detailed, all the opinions of the teachers are shown in Table 1.

Table 1. What are the benefits for the teacher of teaching in a mixed age group in pre-school education?

Code	Participant	Frequency
Providing peer education	K1,K2,K3,K4,K5,K6,K7,K8,K9,K10,K11,K12	12
Facilitating teaching	K1,K2,K3,K4,K5,K6,K7,K8,K9,K10,K11,K12	12
Gaining a rich perspective	K1,K2,K3,K5,K7,K8,K10,K11	8
Accelerating the skill acquisition process	K2,K4,K7,K8,K9,K11,K12	7
Gaining experience	K2,K5,K7,K8,K10,K11	6

According to Table 1, it can be seen that preschool teachers define the benefits of teaching in a mixed age group with five different codes as providing peer education, accelerating the skill acquisition process, facilitating teaching, gaining experience and gaining a rich perspective. All of the teachers agreed that teaching a mixed-age class was beneficial in providing peer education and facilitating teaching. In addition, 8 teachers stated that teaching a mixed age group helped them gain a rich perspective, and seven teachers stated that it was beneficial for them to accelerate the skill acquisition process. Six teachers stated that giving education to a mixed age group helped them to gain experience. Furthermore, in the research, it was concluded that the participants with the codes K2, K7, K8 and K11 expressed their opinions on all codes. Some of the views of preschool teachers regarding this situation are:

"By implementing peer education in the mixed age group, the teacher can facilitate teaching by ensuring that students in the older age group help students in the younger age group." (K2)

"Working with different age groups in pre-school education, preparing the educational environment according to them, gives teachers positive experience and enriches their perspective." (K5)

"Sometimes events can get very complicated, but I'm trying to overcome it as much as I can, and I think it's an experience." (K7)

"Children are very good observers, they grasp everything instantly, they learn by observing their friends, they also make an extra effort when older children finish." (K8)

"In the process, they try to catch up with their friends, they learn not to give up. In fact, they learn most of the things that I didn't teach them from their friends." (K11)

#### 3.2. Findings related to sub-problem

In the interviews with the teachers, it was understood that they expressed various opinions about the difficulties of teaching in preschool with a mixed age group, such as the increase in the workload of the teachers, and the long preparation process. In order to make these more detailed and easier to understand, all the opinions of the teachers are shown in Table 2.

Table 2. What are the difficulties for the teacher of teaching in a mixed age group in pre-school education?

Code	Participant	Frequency
Difficulties in implementing a joint educational plan	K1,K2,K3,K4,K5,K6,K7,K8 K9,K10,K11,K12	12
Inability to provide education appropriate to the level	K1,K2,K3,K4,K5,K6,K7,K8,K9,K10,	12
	K11,K12	
Inability to maintain order in the classroom	K1,K2,K3,K4,K5,K6,K7,K8,K9,K10,K11,	12
	K12	
Increase in workload	K1, K2,K3,K4,K5,K7,K9,K10,K11	9
Long preparation process	K2,K5,K7,K8,K9,K10,K11,K12	8

In Table 2, all 12 teachers expressed their opinions about the difficulties in implementing a joint educational plan, inability to provide education appropriate to the level, and inability to maintain order in the classroom, and in this context, they stated that they had difficulty in teaching in a mixed age group in preschool education. In the research, nine teachers stated that teaching in a mixed age group in preschool education increased the workload of the teacher, and eight teachers stated that teaching in a mixed age group in preschool education requires a long preparation process. It is another remarkable point that more than 50% of the teachers shared a common opinion regarding the difficulties of teaching in a mixed age group in preschool education for teachers. Some of the views of preschool teachers regarding this situation are:

"As the mixed age group includes children from different age groups, we as teachers need a longer preparation period." (K1)

"Preschool teachers may find it difficult to find activities that are appropriate for the level of children in the classroom because what may be difficult for some students may be simple for others." (K9)

"I have a hard time preparing a plan because children with different developmental characteristics are together in a class. It is almost impossible to prepare a plan suitable for all of them." (K10)

"I have a class of 4, 5 and 6 year olds, I think a lot about which level I will address." (K11)

"I hand out the activities in the classroom, I make them do it silently, as soon as I turn my back, the older children either throw pencils or scribble on the papers of the younger ones, unfortunately this is a situation I often experience." (K12)

# 3.3. Findings related to sub-problem

In the interviews with the teachers, it was determined that the teachers expressed various opinions about the benefits of being educated in a pre-school class with a mixed age group, such as accelerating the social absorption process and providing language development. In order to make these more detailed and understandable, all the opinions of the teachers are shown in Table 3.

Table 3. What are the benefits of studying in a mixed age class in pre-school education for the student?

Code	Participant	Frequency
Accelerating the social acquisition process	K1,K2,K3,K4,K5,K6,K7 K8,K9,K10,K11,K12	12
Accelerating the emotional acquisition process	K1,K2,K3,K4,K5,K6,K7,K8,K9,K10,K11,K12	12
Providing language development	K1,K2,K3,K4,K5,K6,K7,K8,K9,K10,K11,K12	12
Setting an example to young children	K1,K2,K3,K4,K6,K8,K9,K10,K11,K12	10
Giving responsibility to older children	K3,K5,K6,K7,K8,K9,K10,K11,K12	9
Reinforcing the knowledge of older children	K3,K4,K5,K6,K7,K8,K10,K11,K12	9
Providing extensive learning opportunities	K2, K5. K6, K9, K11, K12	7

According to Table 3, all of the teachers stated that getting education with mixed age group in preschool education is beneficial in accelerating the social acquisition process of the students, accelerating the emotional acquisition process and providing language development. While 10 teachers stated that it is beneficial to receive education with mixed age group in setting an example for younger children, nine teachers said that older children develop a sense of responsibility towards younger children and reinforce their knowledge. In addition, seven teachers coded as K2, K5, K6, K8, K9, K11 and K12 stated that receiving education with a mixed age group provides students with extensive learning opportunities. Some of the views of preschool teachers regarding this situation are:

"Mixed groups have a great influence on the social improvement of children, they learn how to talk to children older or younger than themselves, and how to treat them." (K1)

"They don't just stick to what I teach, they learn other things every day, especially from children older than themselve." (K4)

"There are young children of foreign nationality in my class, they immediately learned Turkish from children who are Turkish, they showed great language development." (K6)

"In a mixed-age classroom, children can have a wide variety of learning environment, even if the younger ones do not start an activity, they can participate in the activity started by the older ones." (K8)

"Older children reinforce their knowledge while teaching the younger ones. It also supports the language development of different groups." (K11)

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# 3.4. Findings related to sub-problem

In the interviews with the teachers, it was determined that the teachers expressed various opinions about the difficulties of getting education in a pre-school class with a mixed age group, such as lack of growth, pressure from older children. In order to make these more detailed, all the opinions of the teachers are shown in Table 4.

Table 4. What are the difficulties of studying in a mixed age group in pre-school education for the student?

Code	Participant	Frequency
Lack of maturity	K1,K2,K3,K4,K5,K6,K7,K8,K9,K10,K11,K12	12
Lack of growth	K1,K2,K3,K4,K5,K6,K7,K8,K9,K10,K11,K12	12
Pressure from older children	K1,K3,K4,K5,K6,K8,K9,K10,K11,K12	10
Feeling inadequate of young children	K2,K5,K6,K7,K8,K9,K10,K11,K12	9
Feelings of failure in young children	K1,K2,K5,K6,K7,K9,K10,K11,K12	9
Reaction from older children	K2,K3,K4,K5,K7,K8,K10,K12	8
Lack of self-confidence in young children	K1,K2,K4,K6,K8,K10,K12	7

According to Table 4, it was determined that all of the teachers expressed their opinions that physical inadequacies such as lack of maturity and lack of growth made it difficult to study in a mixed-age class. Teachers participating in the research also noted that young children who study in a mixed-age class in preschool education experience pressure and reaction from older children, and this situation causes a sense of inability to achieve, lack of self-confidence in children and children see themselves as inadequate. Some of the opinions of preschool teachers regarding this situation are:

"Mixed age groups may not be able to meet the needs of the individual, as the needs of each age group are different from each other." (K4)

"Since the needs and requirements of each age are different from each other, it can make education difficult to provide separate education for everyone in mixed age groups. Older children are developmentally ahead of younger children, so they naturally sometimes try to force younger ones to do whatever they want." (K6)

"Young children want to do the activities that I prepare for older children, but they cannot do it because they are immature, which makes them feel inadequate." (K7)

"Actually, it can be viewed from two different perspectives. In the joint activity, the older ones feel that they can do it, while the younger ones think that they are not able to do it." (K8)

"No matter how hard I try to prevent it, young children can be exposed to violence from older children while playing games, in the toilet or in the park." (K11)

# 3.5. Findings related to sub-problem

In the interviews with the teachers, it was understood that the teachers expressed various opinions about the benefits of the mixed age group on the learning process, such as facilitating learning and producing common solutions. In order to make these more detailed, all the opinions of the teachers are shown in Table 5.

Table 5. What are the benefits of the mixed age group to the learning process in pre-school education?

Code	Participant	Frequency
Facilitating learning	K1,K2,K3,K4,K5,K6,K7,K8,K9,K10,K11,K12	12
Enabling demonstration method	K1,K2,K3,K4,K5,K6,K7,K8,K9,K10,K11,K12	12
Completing the activity with peer support	K1,K2,K3,K4,K5,K6,K7,K8,K9,K10,K11,K12	12
Producing different ideas	K1,K2,K3,K4,K5,K6,K7,K9,K11	9
Developing joint solutions	K2,K4,K5,K7,K8,K10,K11,K12	8

When Table 5 was examined, it was concluded that the teachers stated the benefits of the mixed age group in preschool education in five different ways as facilitating learning, enabling demonstration method, completing the activity with peer support, producing different ideas, and developing joint solutions. Teachers

reached a consensus on the benefits of mixed age groups in the learning process in pre-school education in terms of facilitating learning, enabling demonstration method, completing the activity with peer support. In addition, nine teachers stated that the mixed age group allowed different ideas to be produced during the learning process in a mixed age group, and 8 teachers stated that the development of joint solution proposals increased. Some of the opinions of preschool teachers regarding this situation are:

"In the mixed age group, the teacher provides the support of the older children to the younger ones, ensuring that the activity is completed in a shorter time and more efficiently." (K3)

"Children give different answers to my questions. There was even an incident like this. While the younger one said it was a pity to the fact that the ant came out of the house and was very cold, the older one replied, "The ant shouldn't have gone out, then." (K5)

"The fact that different children study in the same educational environment allows children to perform activities by seeing a friend or getting help from him. So I can have the opportunity to take care of children who are at a lower level." (K7)

"I have a crowded classroom, I usually sit the high and the low-level children side by side so that they can help each other." (K9)

"Older children understand the activity I give more easily, while younger children can understand it by looking at older ones, even if they don't understand me." (K11)

#### 3.6. Findings related to sub-problem

In the interviews with the teachers, it was understood that the teachers expressed various opinions about the difficulties of the mixed age group in the learning process, such as not being able to finish the activity on time, reluctance, and shyness. In order to make these more detailed, all the opinions of the teachers are shown in Table 6.

Table 6. What are the difficulties of the mixed age group in the learning process in pre-school education?

Code	Participant	Frequency
Finishing the activity early	K1,K2,K3,K4,K5,K6,K7,K8,K9,K10,K11,K12	12
Finishing the activity late	K1,K2,K3,K4,K5,K6,K7,K8,K9,K10,K11,K12	12
Inability to provide quality co-education	K2,K3,K4,K5,K6,K7,K8,K9,K10,K11	10
Lack of materials suitable for all age levels	K1,K3,K4,K6,K7,K8,K9,K10,K11,K12	10
Reluctance	K1,K3,K5,K7,K8,K9,K10,K11,K12	9
Shyness	K2, K4, K5, K7, K8, K10, K11, K12	8

When Table 6 is analyzed, all of the teachers stated that in a mixed age group in preschool education, the students finished the activity early or the students finished the activity late, and this situation made the learning process difficult. In addition, 10 teachers stated that they could not provide quality education during the learning process and that there were not enough materials suitable for all age levels in their classrooms. Nine teachers stated that studying in a mixed age group caused reluctance during the learning process, eight teachers also stated that it caused shyness. Some of the opinions of preschool teachers regarding this situation are:

"We are not able to provide an appropriate education for every student. Co-teaching is not possible under the conditions of my classroom." (K2)

"The problems do not end, let's say that I planned the full activity by working together and this time I can't find the material to match the age level of the activity. I live in the village and I do not have a chance to buy materials whenever I want." (K3)

"I generally prefer to divide the class into groups and give education according to age level. Because the younger children complete the same activity in a very long time, there is an immediate disorder among them, since the older children finish the activity in a shorter time." (K9)

"If the opportunities are limited, we may have difficulties as teachers in terms of finding materials. Sometimes we cannot meet the needs of children and cannot provide efficient education." (K10)

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"The teacher may not find an activity suitable for the level of the children in the class. The same activity may be easy for some students but difficult for others, in this case the student may feel bored or do not want to do the activity." (K12)

# 3.7. Findings related to sub-problem

In the interviews with the teachers, it was understood that the teachers expressed various opinions about the educational environment in a mixed age group, such as an environment with multifunctional materials, an education environment with a wide area. In order to make them more detailed, all the opinions of the teachers are shown in Table 7.

Table 7. How should the educational environment be arranged in a classroom with mixed age groups in preschool education?

school education:			
Code	Participant	Frequency	
Environment with multifunctional materials	K1,K2,K3,K4,K5,K6,K7,K8,K9,K10,K11,K12	12	
Environment enriched with audio-visual equipment	K1,K2,K3,K4,K5,K6,K7,K8,K9,K11,K12	11	
Environment suitable for individual activities	K1,K2,K4,K5,K6,K7,K8,K10,K11,K12	10	
Environment that allows free movement	K1,K2,K4,K5,K7,K9,K10,K11,K12	9	
Spacious educational environment	K1,K3,K4,K6,K8,K9,K11,K12	8	

According to the table, the teachers expressed a common opinion that the educational environment should have multifunctional materials in a mixed-age classroom. While 11 teachers expressed the environment code enriched with visual and auditory equipment in a mixed age group classroom environment in preschool education, 10 teachers expressed the environment code suitable for individual activities and nine teachers expressed the environment code that allows free movement. In addition, it was determined that eight teachers expressed their opinions on the educational environment code with a spacious educational environment. Some of the opinions of preschool teachers regarding this situation are:

"The educational environment, in my opinion, should be arranged in such a way that it can appeal to any age group and it should be at a level that meets the needs of each group." (K2)

"It should be equipped with a lot of visual materials, first of all, there should be comfortable environments with rich materials where children can develop their newly learned skills." (K5)

"It should be a suitable environment where I can easily perform all activities in accordance with the development of children." (K7)

"The material is very important and it is one of the problems that I have experienced the most. Materials must be provided in the classrooms." (K9)

"We need classrooms equipped with visuals where children can move freely and produce their ideas easily." (K12)

#### 4. DISCUSSION

From the results of the research, it is seen that the education with mixed age group in the pre-school period has significant effects on the teacher, student and learning process. The teacher has the biggest share in arranging the teaching to be carried out in a mixed-age classroom [42]. Despite this, teachers have problems in preparing a plan for the teaching process in these classes. As a matter of fact, this situation has a negative effect on students, and as Güder *et al.* [43], Kural and Ceylan [44] have stated, it can cause behavioral problems to arise. Therefore, it does not seem possible for the quality of education given in a classroom where students with behavioral problems to rise above the specified standards.

In the research, it is noteworthy that teachers have a dilemma of opinion against the way of teaching with mixed age. Accordingly, even if the results of the research show that the cognitive, social and language development of the students studying in a mixed age group is faster, it is likely that the students who are exposed to peer bullying will experience negativities in their development processes [45], [46]. However, it

should not be ignored that not all peer communication results in bullying, and the contribution of peer support to teachers and students in this process [47]–[50]. With this research, it can be seen that the quality of the plans prepared, the knowledge and skills of the teachers, the behavior patterns of the students and the quality of the teaching environment are the most important factors affecting the education done with the mixed age group in preschool education. It is important to determine the factors stated and to determine their effects on education with mixed age groups, in terms of being a guide for researchers and educators.

#### 5. CONCLUSION

In the research, it has been determined that teaching in a mixed age group in preschool education provides benefits to the teacher in facilitating the learning process, providing a rich perspective and gaining experience. It has been determined that teachers have difficulties in preparing education plans and in the preliminary preparation process, and that they cannot provide appropriate education for all levels. In addition, it has been determined that these situations negatively affect the psychological health of teachers.

In this research, it was concluded that the students studying in a mixed-age classroom were supported in all areas of development and gained responsibility, cooperation and adaptability. Another result is that students experience lack of self-confidence, low motivation and failure while studying in a mixed age group. It was also revealed that students were frequently exposed to peer bullying. Finally, in the research, it was concluded that the education environment in a mixed age group should have a wide, functional and original design.

The age factor should be taken into consideration while giving education in a mixed age group in the pre-school period, and teaching should be carried out by taking into account the developmental characteristics of the children. For this purpose, different education plans should be prepared together and age-specific in accordance with the age range of the children included in the education, and these plans should be used alternately in educational environments designed as productive, functional and multi-purpose. In these educational environments, tactile, auditory and visual materials can be developed and used. In this context, supportive and entertaining additional activities can be prepared for both the older and younger age groups. Children in the older age group should also be provided with adequate peer support. Suggestions can be made for researchers who will work on this subject to take the opinions of other stakeholders such as school administrators and parents about such classes and to conduct research in such classes through "observation and action". This research, which was carried out at the pre-school education level, may contribute to the literature if it is carried out at other education levels.

# REFERENCES

- [1] B. Zoritch, I. Roberts, and A. Oakley, "Day care for pre-school children," *Cochrane Database of Systematic Reviews*, Oct. 2016, doi: 10.1002/14651858.CD000564.pub2.
- [2] F. G. Cirhinlioglu, Child Development and Mental Health. Istanbul: Nobel Akademik Yayıncılık, 2020.
- [3] S. N. Olimovna and R. S. S. Kizi, "Formation of quantitative representations in the secondary groups in pre-school educational organizations," *International Journal of Research In Commerce, It, Engineering And Social Sciences*, vol. 16, no. 1, 2022.
- [4] M. Downes, J. Bathelt, and M. De Haan, "Event-related potential measures of executive functioning from preschool to adolescence," *Developmental Medicine & Child Neurology*, vol. 59, no. 6, pp. 581–590, Jun. 2017, doi: 10.1111/dmcn.13395.
- [5] Z. Cronin, "To mix or not to mix: A critical review of literature on mixed-age groups in primary schools," *Cambridge Open-Review Educational Research e-Journal*, vol. 6, no. October, pp. 169–179, 2019, doi: 10.17863/CAM.46563.
- [6] T. Göğer and G. Arslantürk, "Self-Regulation and Self-Depletion in Children: The Development and Consequences of Self-Regulation and the Limited Resource Model," Selçuk Üniversitesi Edebiyat Fakültesi Dergisi, no. 45, pp. 375–400, May 2021, doi: 10.21497/sefad.944187.
- [7] Ç. GÜR, Erken Çocukluk Döneminde Gelişim. Ankara: PEGEM AKADEMİ, 2018.
- [8] I. Y. Kazu and M. Yilmaz, "The comparison of some data in Turkish preschool education with OECD, EU member countries," Turkish Journal of Educational Studies, vol. 5, no. 2, pp. 64–75, May 2018, doi: 10.33907/turkjes.404695.
- [9] M. Deutsch, "Facilitating development in pre-school child: social and psychological perspectives," Merrill-Palmer Quarterly of Behavior and Development, vol. 10, no. 3, pp. 249–263, 1964.
- [10] K. Sylva, "Critical periods in childhood learning," British Medical Bulletin, vol. 53, no. 1, pp. 185–197, 1997, doi: 10.1093/oxfordjournals.bmb.a011599.
- [11] H. A. Çiftçi and G. Uyanık, Erken Çocuklukta Yürütücü İşlevler Kuramsal Temeller ve Örnek Etkinlikler. Istanbul: Nobel Akademik Yayıncılık, 2021.
- [12] C. Tayler, "Learning in Early Childhood: experiences, relationships and 'Learning to Be," European Journal of Education, vol. 50, no. 2, pp. 160–174, Jun. 2015, doi: 10.1111/ejed.12117.
- [13] A. Bildiren, "Developmental characteristics of gifted children aged 0–6 years: parental observations," Early Child Development and Care, vol. 188, no. 8, pp. 997–1011, Aug. 2018, doi: 10.1080/03004430.2017.1389919.
- [14] E. Melhuish *et al.*, "A Review of Research on The Effects of Early Childhood Education," 2015. [Online]. Available: https://ecec-care.org/fileadmin/careproject/Publications/reports/CARE\_WP4\_D4\_\_1\_review\_of\_effects\_of\_ecec.pdf.
- [15] A. Doğan-Keskin and N. P. Bayhan, "The past, present, and future of child development," Erken Çocukluk Çalışmaları Dergisi, vol. 4, no. 3, pp. 881–900, Oct. 2020, doi: 10.24130/eccd-jecs.1967202043242.
- [16] R. B. Clyman, "Preschool Development," in Psychiatry, Chichester, UK: John Wiley & Sons, Ltd, 2008, pp. 135-149.

- [17] T. T. Brown and T. L. Jernigan, "Brain Development During the Preschool Years," Neuropsychology Review, vol. 22, no. 4, pp. 313–333, Dec. 2012, doi: 10.1007/s11065-012-9214-1.
- [18] W. Baker, P. Sammons, I. Siraj-Blatchford, K. Sylva, E. C. Melhuish, and B. Taggart, "Aspirations, education and inequality in England: insights from the Effective Provision of Pre-school, Primary and Secondary Education Project," Oxford Review of Education, vol. 40, no. 5, pp. 525–542, Sep. 2014, doi: 10.1080/03054985.2014.953921.
- [19] M. Çelik, "The Analysis of preschool children' pattern skill development," *Journal of Early Childhood Studies*, vol. 4, no. 2, pp. 316–330, Oct. 2020, doi: 10.24130/eccd-jecs.1967202042143.
- [20] A. Oktay, Learning in the preschool period and reading readiness, vol. 17, no. 39. 1982.
- [21] A. Ulutaş, E. Demir, and E. H. Yayan, "The effect of the motor development training program on rough and fine motor development of five-six-year old children," Abant İzzet Baysal Üniversitesi Eğitim Fakültesi Dergisi, vol. 17, no. 3, pp. 1523–1538, Sep. 2017, doi: 10.17240/aibuefd.2017.17.31178-338846.
- [22] F. Yamaner and G. Çiçek, Motor development and play in children. Istanbul: Nobel Akademik Yayıncılık, 2021.
- [23] W. S. Barnett and D. J. Yarosz, "Who goes to preschool and why does it matter?," *Policy Matters*, vol. 8, no. 15, pp. 2–16, 2004.
- [24] P. A. M. Mwaura, K. Sylva, and L. Malmberg, "Evaluating the Madrasa preschool programme in East Africa: a quasi-experimental study," *International Journal of Early Years Education*, vol. 16, no. 3, pp. 237–255, Oct. 2008, doi: 10.1080/09669760802357121.
- [25] O. Aktan and Ü. Akkutay, "Preschool education in OECD countries and Turkey," *Asian Journal of Instruction (E-AJI)*, vol. 2, no. 1, pp. 64–79, 2014.
- [26] J. Einarsdottir, "From Pre-school to Primary School: When different contexts meet," Scandinavian Journal of Educational Research, vol. 50, no. 2, pp. 165–184, Apr. 2006, doi: 10.1080/00313830600575965.
- [27] N. V. Moskalenko et al., "Physical condition of pupils of pre-school educational establishments of different types," Pedagogy of Physical Culture and Sports, vol. 24, no. 2, pp. 77–84, Apr. 2020, doi: 10.15561/26649837.2020.0205.
- [28] R. C. Pianta, "Adult-Child Relationship Processes and Early Schooling," Early Education & Development, vol. 8, no. 1, pp. 11–26, Jan. 1997, doi: 10.1207/s15566935eed0801\_2.
- [29] E. Dereli, "Investigation of the effects of the montessori educational program on children's psychosocial development and the social problem solving skills," *Journal of the Faculty of Education of Ahi Evran University*.
- [30] H. G. Ertürk-kara, "Primary and kindergarten teachers' opinions on mixed age grouping education," Journal of Theoretical Educational Science, vol. 11, no. 2, pp. 279–295, Mar. 2018, doi: 10.30831/akukeg.355337.
- [31] P. AKSOY, "The views of the preschool teachers working at classes where montessori approach is applied on the different, strong and challenging sides of the montessori approach: The case of America and Turkey," Eurasian Journal of Researches in Social and Economics, vol. 7, no. 10, pp. 278–309, 2020.
- [32] Y. Wu, L. E. Schulz, M. C. Frank, and H. Gweon, "Emotion as Information in Early Social Learning," Current Directions in Psychological Science, vol. 30, no. 6, pp. 468–475, Dec. 2021, doi: 10.1177/09637214211040779.
- [33] N. Ölekli, "A conceptual study on the effect of montessori approach on social life skills of preschool children," *Social Sciences Studies Journal*, vol. 3, no. 10, pp. 1212–1216, Jan. 2017, doi: 10.26449/sssj.157.
- [34] S. Giren, "Kindergarten teachers and primary school managers' views about the reflections on preschool education of the 4+4+4 education system," *Journal of Education for Life*, vol. 35, no. 2, pp. 733–757, Sep. 2021, doi: 10.33308/26674874.2021352324.
- [35] J. P. Piek, B. Hands, and M. K. Licari, "Assessment of motor functioning in the preschool period," Neuropsychology Review, vol. 22, no. 4, pp. 402–413, 2012, doi: 10.1007/s11065-012-9211-4.
- [36] H. Gulay, "Peer relationships in preschool period," *Journal of the Institute of Social Sciences of Balikesir University*, vol. 12, no. 22, pp. 82–93, 2009.
- [37] A. Goodman, H. Joshi, and B. Nasim, "Social and emotional skills in childhood and their long-term effects on adult life," *A review for the Early Intervention Foundation*, no. March, p. 118, 2015.
- [38] F. Ağgül Yalçin and M. Yalçin, "Preschool teachers' views of preschool educational problems: Agri city sample," *Elemantary Education Online*, pp. 367–383, Mar. 2018, doi: 10.17051/ilkonline.2018.413784.
- [39] J. S. Hong and D. L. Espelage, "A review of mixed methods research on bullying and peer victimization in school," *Educational Review*, vol. 64, no. 1, pp. 115–126, Feb. 2012, doi: 10.1080/00131911.2011.598917.
- [40] C. Başturan and E. Görgü, "Occupational problem definitions of teachers: An evaluation in the context of preschool teachers," Journal of Education for Life, vol. 34, no. 1, pp. 79–98, Mar. 2020, doi: 10.33308/26674874.2020341163.
- [41] Ş. Büyüköztürk, E. K. Çakmak, Ö. E. Akgün, Ş. Karadeniz, and F. Demirel, "Methods of scientific research," Elementary Education Online, vol. 13, no. 2, pp. 2–5, 2014, [Online]. Available: https://www.bibliomed.org/mnsfulltext/218/218-1596948540.pdf?1671082710.
- [42] İ. T. ŞAHİN SAK, "Okul öncesi öğretmen adaylarının Montessori ve Reggio Emilia yaklaşımları ile ilgili görüşleri," İnönü Üniversitesi Eğitim Fakültesi Dergisi, vol. 15, no. 3, Feb. 2015, doi: 10.17679/iuefd.58218.
- [43] S. Y. Güder, E. Alabay, and E. Güner, "Okul Öncesi Öğretmenlerinin Sınıflarında Karşılaştıkları Davranış Problemleri ve Kullandıkları Stratejiler," İlköğretim Online, vol. 17, no. 1, pp. 414–430, Mar. 2018, doi: 10.17051/ilkonline.2018.413792.
- [44] E. K.-R. Ceylan, "Montessori Eğitmenleri 3-6 Yaş Erken Çocukluk Siniflarinda Hazirlanmiş Çevreyi Nasil Düzenliyor?," *The Journal of Academic Social Sciences*, vol. 114, no. 114, pp. 169–191, 2021, doi: 10.29228/ASOS.49198.
- [45] D. Eslek and T. Yılmaz Irmak, "Ekolojik Sistemler Kurami Çerçevesinde Göçmen Çocuklar Ve Oyunlari Üzerine Bir Derleme," Dokuz Eylül Üniversitesi Sosyal Bilimler Enstitüsü Dergisi, vol. 20, no. 3, Oct. 2018, doi: 10.16953/deusosbil.297792.
- [46] T. Türk kurtça, E. Armağan Çağlar, and Y. Sanal Özcan, "Akran Zorbalığı ve Travma Sonrası Stres Bozukluğu Arasındaki İlişkinin Gözden Geçirilmesi," Kastamonu Eğitim Dergisi, vol. 28, no. 2, Mar. 2020, doi: 10.24106/kefdergi.693410.
- [47] Ş. Danışman, "Montessori yaklaşımına genel bir bakış ve eğitim ortamının düzenlenmesi," *Eğitimde Politika Analizi Dergisi*, vol. 1, no. 2, pp. 85–113, 2012, [Online]. Available: https://dergipark.org.tr.
- [48] Z. Özkartal, O. Sarigöz, and A. Dönger, "An investigation into variables that affect self efficacy beliefs of people working in educational institutions," *International Refereed Academic Social Sciences Journal*, no. 24, pp. 1–1, Dec. 2016, doi: 10.17364/IIB.20162423324.
- [49] S. Schreglmann and Z. Kazanci, "A Lesson Plan Development Study for Higher Education Based on Needs Assessment 'Graphics and Animation in Education' Course," *International Education Studies*, vol. 11, no. 7, p. 155, Jun. 2018, doi: 10.5539/ies.v11n7p155.
- [50] O. Sarigoz, "Anthropological Attitudes and Views of the Teachers Towards Lifelong Learning," The Anthropologist, vol. 24, no. 2, pp. 598–610, May 2016, doi: 10.1080/09720073.2016.11892054.

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