

Effects of COVID-19 On Children in Public Care; Depression And Anxiety Levels

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ÖZ

Amaç: sevgi evlerindeki çocukların COVID-19'dan etkilenme durumunu belirlemek.

Yöntem: Tanımlayıcı tipte olan bu araştırmanın evrenini, sevgi evlerinde yaşayan 7-12 yaş arasındaki çocuklar oluşturmuştur. Araştırma kapsamında 83 çocuğa ulaşılmıştır. Veri toplama aracı olarak anket formu, Çocuklar İçin Beck Depresyon Ölçeği ve Çocuklar İçin Sürekli Kaygı Envanteri kullanılmıştır. Veriler, tanımlayıcı analizler ve fark analizleri kullanılarak analiz edilmiştir. İstatistiksel anlamlılık $p < 0.05$ olarak kabul edildi.

Bulgular: Çocukların yaş ortalaması 11.18 ± 1.58 yıldır. Çocukların salgın nedeniyle ortalama korku puanı kendilerine göre 2.42 ± 1.34 , gözlemciye göre 2.42 ± 1.22 idi. Çocukların Beck Depresyon Ölçeği puan ortalaması $5,51 \pm 3,06$ olarak belirlendi. %62.7'sinin ($n=52$) düşük, %37.3'ünün ($n=31$) orta derecede depresif olduğu belirlendi. Hem durumluk ($35,57 \pm 6,16$) hem de sürekli ($38,43 \pm 6,41$) kaygı puanları ortalama değer üzerinde bulunmuştur. Çocukların depresyon ve anksiyete puan ortalamalarının cinsiyete ve anne-babanın çocukla ilgilenmesine göre farklılık gösterdiği belirlendi.

Sonuç: Sevgi evlerindeki çocukların pandemi sürecinde orta düzeyde anksiyete ve depresyon yaşadıkları belirlendi. En çok kaygı ve depresyon yaşayanların erkek ve anne-babası ilgilenmeyen çocuklar olduğu görüldü.

Anahtar Kelimeler: Anksiyete, Çocuk, COVID-19, Depresyon, Kamu Bakımı

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ABSTRACT

Aim: To determine the status of children in public care being affected by the COVID-19.

Methods: The population of this descriptive study was composed of children between the ages of 7 and 12 living under the public care. 83 children were reached within the scope of the study. A questionnaire form, Beck Depression Scale for Children and State Trait Anxiety Inventory for Children were used as data collection tools. Data were analyzed using descriptive analyzes and difference analyzes. Statistical significance was accepted as $p < 0.05$.

Results: The mean age of the children is 11.18 ± 1.58 years. The mean fear score of the children due to the epidemic was 2.42 ± 1.34 according to themselves and 2.42 ± 1.22 according to the observer. The mean score of the children's Beck Depression Scale was determined as 5.51 ± 3.06 . It was determined that 62.7% ($n=52$) were low and 37.3% ($n=31$) were moderately depressed. Both state (35.57 ± 6.16) and trait (38.43 ± 6.41) anxiety scores were found to be above the median value. It was determined that the depression and anxiety score averages of the

children varied according to the genders and the parents' involvement with the child.

Conclusion: It was determined that children in public care experienced moderate anxiety and depression during the pandemic process. It was observed that those who experienced anxiety and depression the most were men and children whose parents were not interested.

Keywords: Anxiety, Child, COVID-19, Depression, Public Care

1. Introduction

COVID-19 epidemic has a critical process to people and led to worry worldwide [1,2]. This disease affecting all countries has been declared by the World Health Organization as pandemic disease in 11 March 2020 [3]. Diseases transmitted by respiratory diseases in contagious diseases are spread the fastest [4]. Although the newly detected COVID-19 virus is known to be infected with respiratory droplets and contacts, it is difficult to isolate, because there is no adequate information about the treatment of difficulties in the treatment and the rapid spread of the disease was not prevented the spread of the disease [1,2].

The epidemic has been implemented rapidly in all world countries, while the Chinese government implemented in the fight against COVID-19 outbreaks and the positive results of the insulation of social distance and infected populations have been struggling in countries where the release of the release of the infected populations are spread out [5]. World governments continue to take a series of precautions in order to prevent potential impacts of the release. Health institutions coordinate the information flow and publish directives and instructions to optimize the impact of the threat [6]. Although these measures are implemented, the number of new cases reported continues to increase in an anxious rate [7]. Although specific drugs for COVID-19 are not yet widespread, other public health and social measures play an

important role in reducing the number of infections and saving life. Social and Physical Distance Measures aim to slow the disease spread by stopping the contamination chains [8]. Prevention is the basic basis in the treatment and destruction of COVID-19 epidemic [9]. In the fight against COVID-19, many developed countries have tended to protect the disadvantaged groups most vulnerable in infections. Therefore, volunteers and compulsory quarantine administration in epidemic actions of countries have measures such as mass meetings, international travel and training, closure of schools, conditions of closure of cities [5].

In the first days of the COVID-19, pediatric patients were very rarely seen; the pediatric group was not sensitive to this virus. However, with the emergence of familial clustering's, children do cases exposed to COVID-19 infection have been reported [2].

Clinical symptoms of children's COVID-19 cases are generally lighter than adult patients, preschool age children and babies should not be ignored that they are vulnerable to infection [3,10-12]. It is also known that the child of all ages is sensitive to COVID-19 and there is no significant gender difference [11]. It is also attracted to asymptomatic in children with no chronic disease [10,13].

The pediatric nurse is responsible for both maintaining the health status of the child and determining the situation and intervening when there is a deviation from health. For this reason, the pediatric nurse has great responsibilities in every field where the child is present. These responsibilities may be the maintenance or restoration of physical well-being, as well as the maintenance or restoration of psychological health. It may be necessary to take more responsibility for the health of children, especially those in the disadvantaged group. The difficulty of isolating diseases such as COVID-19 also increases the importance to be given to ways

of protection. COVID-19 negatively affects all members of society. Every individual may have a condition of being sick, as well as psychological problems such as anxiety about getting sick or fear of death. The basic requirements of individuals are directed to people's behavior. People also have spiritual requirements as well as physical requirements such as eating, drinking. A need for love, belonging, independence, reputation, as success can create tension in the individual. Such tensions can be seen in all development stages [14]. Psychological problems and fractions along with COVID-19 were seen in individuals of all ages and each gender. In particular, the possibilities of the remaining children in the event of living out of their parent are higher than the other children. For this reason, this study was conducted to evaluate the mental state of children under state protection.

2. Material and Methods

The population of this study consisted of children aged 7-12 living in public care located in two randomly determined provinces in the Central Anatolia Region. Approximately 140 kids remain in determined institutions and are aimed to reach all children under the study. 83 children were included in the study. Of the participants who can be researched;

- be between 7-12 years of age living in determined institutions,
- the absence of any chronic disease
- the absence of a previously recognized psychiatric discomfort
- The fact that it was volunteering to participate in the study was determined as criteria.

The data was collected with the survey form, Beck Depression Scale for Children and State-Trait Anxiety Inventory for Children.

2.1. Beck Depression Scale for Children

This scale was created by Beck et al. (1974). The scale contains 20 articles, and are used them to determine individuals' the level of hope or pessimism for the future. One points are added if

the individual gives the expected response on the scale. The total score is considered as "despair" score. The lowest score from this scale is 0 and the highest score is 20. According to the calculations, the scores of 0-6 points are classified as low depression, 7-13 points as medium depression and high depression between 14-20 points. 1, 3, 5, 6, 8, 10, 13, 15, 19. to each 'no' response in questions in the scale; Every 'yes' response in the remaining questions is given one point. The higher the score from the scale, the higher the despair in the person is commented as it is so high [15].

2.2. State-Trait Anxiety Inventory for Children

The scale was developed by Spielberger (1973). Adaptation to Turkish, validity and reliability were made by Özusta (1993). The scale consists of a total of 40 items, including the "Status Anxiety Scale", "Continuous Anxiety Scale" and 20 items in each part. "Almost Ever", "sometimes" and "often" responses to the scale. From these statements 'often' the highest score of 3 leads to the "almost never" of the lowest score of 1. Points to be taken from the scale range from 20 to 60 [16].

Before starting data collection, ethical approval was obtained from the Non-Interventional Ethics Committee of X University (Date: 30.09.2020, Number 07-2020/42), and institutional permissions and parental permissions were also completed. Data were analyzed in computer environment. In the analysis of the data, descriptive analyzes (number, percentage, average, standard deviation) and difference analyzes (t test, square, ANOVA, etc.) was used. Statistical significance was considered $p < 0.05$.

3. Results

The mean age of children is 11.18 ± 1.58 years. The number of siblings is 3.60 ± 1.89 , the duration of the institution is 3.84 ± 2.47 years. 69.9% of the participants are female. The reasons for children are mostly determined to be the disruption of family integrity (59%). Other than

that, there are also children from the drying due to abandonment (18.1%), exploit (14.5%) or poverty (8.4%). The majority of the children is living (78.3%) of the majority of the children (78.3%), closely (42.2%) were constantly interested. The way to protect the relative to children was to wear mask (100%) and wash

Table 1. Distributions of children to their demographic characteristics and their thoughts on epidemic

Demographic Features	Number	%
Gender		
Female	58	69.9
Male	25	30.1
Reason for Application		
Poverty	7	8.4
Disruption of family union	49	59
Exploitation	12	14.5
Abandonment	15	18.1
Mum-father's state of living		
Mother and father right	65	78.3
Mother's right	7	8.4
Father's right	8	9.6
Mother and father do not live	3	3.6
The parent's state of interest		
Is not interested	21	25.3
Sometimes interested in	19	22.9
Most of the time is interested	8	9.6
Is constantly interested in	35	42.2
Precautions to be protected from the epidemic		
Washing hands	77	92.8
Not to meet with friends	12	14.5
Wearing mask	83	100
Most missed in the period of epidemic		
To meet with my family	3	3.6
Hug	5	6.0
To go outside	75	90.4
The state of being afraid of the disease's transmission		
Afraid of	66	79.5

hands (92.8%). During the epidemic, the children reported to be the most missing to go outside (90.4%), hug (6%) and to meet with their families (3.6%). In addition, the majority of children (79.5%) were afraid to be patients and to inflict disease to his friend (83.1%) (Table 1).

Not afraid of	17	20.5
The state of being afraid transmission to friends of the disease		
Afraid of	69	83.1
Not afraid of	14	16.9

The average of children's disease-related fear is 2.42 ± 1.34 according to their own, 2.42 ± 1.22 according to the observer. All of the children had knowledge of the epidemic and stated that they informed their institution. The average of children's depression and anxiety points were given in Table 2.

Table 2. Children's depression and anxiety points

Scales	Mean \pm SD	Min.	Max.
The average of Beck Depression Scale points	5.51 \pm 3.06	0	12
The average of State Anxiety Scale points	35.57 \pm 6.16	20	47
The average of Trade Anxiety Scale points	38.43 \pm 6.41	20	55

Children's Beck Depression Scale Score is determined as 5.51 ± 3.06 and is under the middle value. However, it was determined that both state (35.57 ± 6.16) and trade (38.43 ± 6.41) scale score were above the medium value (Table 2). When the depression levels of the children are evaluated, 62.7% (n = 52) were low, 37.3% (n = 31) was moderately depressed.

When the demographic characteristics affecting children's anxiety and depression were evaluated, it was seen that there was a significant difference between the groups according to the variables of gender and parental interest. Both

depression and trait anxiety mean scores of boys were found to be significantly higher. It was determined that there was a significant difference between the groups in terms of parental attention and mean scores of depression and anxiety (Table 3). In the further analysis, it was determined that the depression and anxiety mean scores of the children whose parents weren't

interested were significantly higher than those whose parents were sometimes interested ($p_{\text{depression}}=0.034$; $p_{\text{state anxiety}}=0.037$). It was determined that there was no significant difference between the other variables examined within the scope of the study in terms of both depression and anxiety scores ($p>0.05$).

Table 3. Depression and anxiety mean scores of children according to their gender and parental interest and comparison between groups

	Depression Mean \pm SD	State Anxiety Mean \pm SD	Trait Anxiety Mean \pm SD
Gender			
Female	4,31 \pm 2,30	35,17 \pm 6,17	37,32 \pm 6,33
Male	8,28 \pm 2,81	36,48 \pm 6,15	41,00 \pm 5,94
χ^2	-6,736	-0,887	-2,468
p	<0,001	0,378	0,016
Parental interest			
Not interested	6.67 \pm 3.47	38.57 \pm 4.84	38.67 \pm 5.69
Sometimes interested	4.05 \pm 2.53	34.00 \pm 6.77	37.26 \pm 7.92
Often interested	6.00 \pm 4.47	32.50 \pm 7.46	37.88 \pm 5.22
Always interested	5.49 \pm 2.43	35.31 \pm 5.71	39.06 \pm 6.32
χ^2	0.048	0.031	0.962
p			

4. Discussion

COVID-19 is a serious epidemic that affects people of all ages, genders and races. Since children cannot meet many of their developmental, emotional, social and behavioral needs on their own, they are more affected by traumatic events such as pandemics due to their lack of knowledge and skills in many subjects. In addition to the physical effects of the epidemic on children, psychological and emotional effects are also seen [17]. Restrictions in the daily lives of children during the pandemic process can cause them to experience panic, fear and depression [18]. In particular, children under state protection, who are defined as the disadvantaged group, may be even more affected by this situation. Children under state protection are those who experience some emotions more

intensely due to the effect of being away from the family. The addition of a deadly disease such as a pandemic to this situation and the fact that it brought some limitations may have further affected the mental state of the children. In the study conducted to determine the anxiety and depression status of children aged 7-12 under state protection during the pandemic process, it was determined that 62.7% (n=52) of the children had low depression and 37.3% (n=31) had moderate depression. In the study conducted to determine the anxiety and depression status of children aged 7-12 under state protection during the pandemic process, it was determined that 62.7% (n=52) of the children had low depression and 37.3% (n=31) had moderate depression. In terms of anxiety, it was seen that both state and trait anxiety mean scores were above the middle

value. In this case, it can be said that children experience both depression (mild or moderate) and anxiety.

When the literature was examined, no study was found that evaluated the effect of the COVID-19 process on children under state protection. However, there are studies conducted in children from different age groups [17,19,20]. A preliminary study conducted in Shaanxi Province, China, at the beginning of the pandemic process (February 2020), examined the psychological and behavioral problems of a total of 310 children (168 girls, 142 boys) aged 3-18 years. As a result of the study, it was revealed that children commonly avoid hugging and asking questions about the epidemic, as well as symptoms of distraction and irritability.¹⁹ Again, in a study conducted with 8000 students aged 12-18 in China, it was reported that depressive symptoms were observed in 43%, anxiety symptoms in 37%, and anxiety symptoms accompanying depressive symptoms in 31% [21]. Liang et al. (2020) also stated that the rate of experiencing psychological problems in adolescents is 40% [22].

These negative emotional changes experienced by children also negatively affect their physical and mental health [20]. In a study conducted with 320 children and adolescents aged 3-18 years, it was found that during the pandemic process, children experienced stubbornness, distraction, irritability and fear of asking questions about the epidemic [19]. In another study, it was stated that ninth grade students experienced more "stress, fear, anxiety, crying for no reason and getting angry quickly" compared to 12th grade students during the COVID-19 process [23]. Loades et al. (2020) was found that social isolation and loneliness during the pandemic process increased the anxiety level of adolescents [24]. All these

findings show that many individuals in the child age group experience psychological problems.

Not every child experiences anxiety and depression at the same level. In the literature, it is stated that the anxiety and depression experienced by children during traumatic events can affect the involvement of themselves or those around them [25]. Especially for children in school years when peer interaction is intense and ahead, friends may even be ahead of themselves in some matters. In this study, the majority of children stated that they were afraid of catching the disease (79.5%) or infecting their friends (83.1%). This shows that the pandemic has caused great fear in children. It was seen that the most disturbing situation of these children was the possibility of transmitting the disease to their friend rather than being sick themselves.

There can be many factors that affect children's anxiety and depression levels. In the study, it was observed that the mean scores of depression and trait anxiety differed by gender. It has been determined that boys are more depressed and more anxious than girls. No change was observed in the state anxiety score. According to this, the anxiety experienced by children in the recent past does not change according to gender. In this case, it can be said that the anxiety experienced during the pandemic process does not differ according to gender. However, it has also been observed that boys experience more intense emotional attrition in long-term effects.

In order for children to cope effectively with traumatic events such as pandemics and not to experience depression or anxiety, the coping skill levels of caregivers, especially families, are of great importance. In addition, emotional situations such as the absence of parents can increase the anxiety experienced [25,26]. In the study, it was determined that the depression and

anxiety score averages of the children whose parents were not interested were higher ($p_{\text{depression}}=0.034$ $p_{\text{state anxiety}}=0.037$). From this point of view, it can be said that children who are not with their parents are at higher risk of experiencing anxiety and depression.

5. Conclusion

It has been observed that children in public care during the COVID-19 pandemic process are at moderate risk in terms of psychological problems such as depression and anxiety. It has been observed that the behavior that these children miss the most is walking outside, and they also miss emotional behaviors such as hugging their mothers and meeting with the family. Most of the children stated that they were afraid of both getting sick and transmitting the disease.

It has been determined that the depression and anxiety score averages of the children vary according to gender and parental involvement. It has been observed that boys and children whose parents are not interested experience more intense depression. In addition, it has been determined that the parents of the children who experience the most anxiety during the pandemic process are those whose parents are not interested. In the light of all these findings, it is recommended to provide emotional support to children under state protection in traumatic situations such as pandemics. It is recommended to inform pediatric nurses about whom, how much and how this support will be provided, and to support the maintenance of the health of these children with a multidisciplinary approach.

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