

## Examining the Occupational Anxiety Levels of Teacher Candidates during Covid-19 Pandemic Process<sup>i</sup>

Seyithan DEMİRDAĞ\*, Zonguldak Bulent Ecevit University, Educational Sciences, Turkey, ORCID ID: 0000-0002-4083-2704, [seyithandemirdag@gmail.com](mailto:seyithandemirdag@gmail.com)

Mürside Ceren AKSAL, Zonguldak Bulent Ecevit University, Educational Sciences, Turkey, ORCID ID: 0000-0003-4798-3887, [mursideaksal43800@gmail.com](mailto:mursideaksal43800@gmail.com)

---

**Abstract:** In the study, it was aimed to determine the occupational anxiety levels of teacher candidates during the COVID-19 pandemic process. A quantitative approach was employed in accordance with the purpose of the study. The data was collected from three different universities in the Western Black Sea Region. Participants were identified using purposive sampling techniques. Accordingly, the sample of the quantitative study consisted of 457 pre-service teachers. An instrument called Occupational Anxiety Inventory for Teacher Candidates (OAI) was applied to the participants. For the analysis of the collected quantitative data, frequency, mean and standard deviation values were calculated in the context of the answers to the descriptive questions. Independent Sample T-Test and One-Way Analysis of Variance (ANOVA) was used to detect significant differences between groups.

Keywords: *Occupational Anxiety, Pandemic, COVID-19, Teacher Candidates.*

---

### 1. INTRODUCTION

Students studying at universities are sometimes exposed to various questions about their teaching profession after graduation. Students have various concerns about what kind of problems they will encounter, especially when teaching in the field. Although internship programs such as School Experience provided to students at universities reduce these concerns to some extent, it cannot be said that they completely satisfy students. Although until recently, students knew superficially what kind of situations teachers in the field were exposed to, the increase in uncertainties with the COVID-19 pandemic negatively affected students' anxiety levels (Leite et al., 2020). The COVID-19 pandemic also affected teachers in the field.

---

<sup>i</sup> This study is produced from research titled “Examining the occupational anxiety levels of teacher candidates during the pandemic process” which was funded by TUBITAK’s 2209-A Program (Research Project Support Program for Undergraduate Students).

The COVID-19 outbreak caused by the SARS-CoV-2 virus that emerged in Wuhan, China on December 31, 2019. In a very short time, it has seriously affected the ordinary course of humanity by influencing first China and then all the countries of the world (Dikmen et al., 2020). The COVID-19 outbreak, which caused the death of 4000 people on March 11, 2020, has been declared a pandemic by the World Health Organization (WHO) (WHO, 2020). The disease is highly contagious and its main symptoms include dry cough, fever, fatigue, muscle pain and shortness of breath. In 2002, SARS-CoV broke out in China and caused hundreds of deaths with an 11% fatality rate. In 2012, MERS-CoV emerged in Saudi Arabia and spread to other countries with a fatality rate of 37%. SARS-CoV-2, which causes COVID-19 disease, is a serious respiratory failure disease. Although the transmission rate is quite high, the fatality rate has been reported to be lower (3-4%) than previous coronaviruses (Memikoğlu & Genç, 2020).

The effects of the COVID-19 pandemic have affected all countries in almost every field, as well as in the field of education. The current problems of teachers working in schools have increased exponentially with the pandemic. In line with the decisions taken by the governments, education systems have decided to continue their teaching activities in the form of distance education. Although a sustainable education was planned together with distance education in theory, this situation was not possible at the desired level in practice. The fact that some schools do not have the necessary infrastructure for distance education and students' problems in accessing the internet, tablets and computers have caused a crisis in schools. Due to all of these situations, various anxieties have already begun to appear in teacher candidates who have observed these negativities in schools.

## **2. LITERATURE REVIEW**

The COVID-19 pandemic has political, social, societal, and psychological effects. It is an important process that needs to be addressed from all aspects. Because people feel themselves in a great danger during this process. While this process leaves traumatic effects on people, it also effects their psychology (Bozdağ, 2020). The reactions expected to be observed as a result of trauma took place step by step during the epidemic period. The fact that the virus cannot be seen with the naked eye and that all individuals are at risk has created an uncertainty. Along with this uncertainty, feelings such as fear, unhappiness, hopelessness and helplessness created anxiety among people. In the early days of the epidemic, the physical effects attracted everyone's attention, but the mental health and psychological effects were not emphasized. However, it is an undeniable fact that even if the epidemic ends one day, its psychological effects will continue for years (Bozkurt et al., 2020). In order to be protected from COVID-19, a person must be strong psychologically and physically. The COVID-19 pandemic, which causes many negative emotions in people, creates a risk for psychological resilience (Bozdağ, 2020).

The COVID-19 pandemic has affected the education system of all countries of the world, causing schools and universities to be closed in order to take precautions (Can, 2020). This interruption of education in schools has worried all stakeholders, including educators, students, and parents (Sarı & Nayır, 2020). Many countries were caught unprepared for one of the

biggest problems that education can face throughout history. As a result those countries had to employ compulsory distance (online) education (Özer & Suna, 2020).

Distance education has brought benefits and limitations as it enters in people's lives. A well-structured distance education system has enabled students who cannot attend traditional education for various reasons including those who are afraid due to their age, live far from school, and have some types of cognitive or physical disabilities (Özer & Suna, 2020). In addition to these, there are also features and abilities that will be added to the student: honesty, business ethics, perseverance, self-learning skills are some of them (Sarı & Nayır, 2020).

In addition to the benefits it provides, distance education eliminates the social environment that students can have at school. This causes students who stay away from the social environment and their peers to stay away from competition and motivational elements. While in face-to-face education, the teaching method and learning response develop together and intertwined. However, these two elements are separated from each other in distance education. This causes students to feel bad and not to receive sufficient support from their teachers (Özer & Suna, 2020). Distance education also causes learning loss and increased school dropout rates. In addition, this situation has caused inequality of opportunity in access to education both in Turkey and in other developing countries (Sarı & Nayır, 2020).

The uncertainties experienced by the teachers working in the schools due to the losses experienced by the students in education have led to the formation of undesirable situations such as stress and anxiety. Student candidates in universities did not remain indifferent to these negativities experienced in universities. They are increasingly concerned about whether they will be exposed to similar problems, especially if they are appointed. Accordingly, pre-service teachers should understand what occupational anxiety is and seek ways to cope with this anxiety and get the necessary support.

Anxiety; emotions such as distress, uncertainty, fear, anxiety and loss of control that an individual feel when faced with a threatening or frightening situation. It is an unpleasant feeling with the expectation that a bad event has occurred or is about to happen (Dursun & Karagün, 2012). The feeling of fear becomes anxiety when the feeling of fear has become widespread and has lost its cause or object. Anxious person feels vaguely afraid without knowing what the problem is (Kaya & Varol, 2004). Anxiety occurs mostly in situations that negatively affect the individual or when the individual's self-integrity is under threat (Bozdam & Taşgın, 2011). Today, studies on the occupational anxiety of teacher candidates are the ones that aimed at determining and eliminating the causes of anxiety of students. Since the teaching profession requires an intense effort, teachers are worried about what is lined ahead (Frenzel et al., 2016). Not being able to teach students well enough, being indifferent to the lessons and experiencing socio-economic problems are among the factors affecting the anxiety level of the teacher candidates (Mizala et al., 2015). In addition to these, professional insecurity and inadequacy are factors that increase the level of anxiety in teachers. In a study it was determined that pre-service teachers had concerns about the level of communication with students, finding a job, professional acceptance, environment and school life. Another phenomenon that drives prospective teachers to despair and anxiety is the Public Personnel Selection Examination

(KPSS). The expectation of pre-service teachers to get a good score in this exam in order to be appointed as a teacher caused their anxiety levels to increase. As a result, the fear of failing in this exam drags them in a great anxiety (Cabi & Yalçınalp, 2013). Finally, the problem that pre-service teachers call "assignment problem" is the most striking one among the reasons for anxiety. It is stated that universities train more teachers than the country needs (Akpınar, 2013). When the uncertainties created by the pandemic are added to these situations, the level of anxiety can increase exponentially (Talidong & Toquero, 2020).

In addition to all these anxiety situations that pre-service teachers are exposed to, the uncertainties brought about by the COVID-19 pandemic have further triggered the anxiety of these pre-service teachers. Infrastructure problems related to distance education observed by teacher candidates in schools, lack of communication between school administration and teachers, students' parents being disconnected from school, and students' lack of internet opportunities further deepened their existing anxiety.

The research results obtained within the scope of the importance of the study will contribute to the strategies and plans to be prepared in this context by providing important information about occupational anxiety to policy makers, education administrators and practitioners during the pandemic process. In this sense, in order to eliminate the professional anxiety of undergraduate teacher candidates, necessary support will be provided to the candidates both in psychological terms and in terms of providing information within the scope of education faculties. It will also be ensured that the candidates continue their education effectively, free from professional anxiety. In schools affiliated with the Ministry of National Education (MEB), school administrators and experienced teachers working at the school will be informed about the occupational anxiety experienced by pre-service teachers during the pandemic process, and the necessary environment and strategies will be put in place so that the newly appointed teachers can be more comfortable and effective at school without anxiety. In line with this aim the following research questions were studied:

- 1- What is the occupational anxiety level of teacher candidates?
- 2- Is there a significant difference of occupational anxiety level based on teacher candidates' genders?
- 3- Is there a significant difference of occupational anxiety level based on teacher candidates' university levels?
- 4- Is there a significant difference of occupational anxiety level based on teacher candidates' departments?
- 5- Is there a significant difference of occupational anxiety level based on teacher candidates' university?

### **3. METHODOLOGY**

A quantitative research method including a descriptive scanning design was employed in this study. Scanning models are models that aim to describe a past or present situation (Karasar, 2012). In this approach, the elements that are the subject of the research are defined in the

context of the conditions found. Accordingly, the professional anxiety levels of teacher candidates were examined through the Likert type scale used in this study.

### 3.1. Sample

The target population of this study consists of pre-service teachers studying at universities in the Western Black Sea Region. The sample of the study consists of 457 pre-service teachers from three different universities. It was aimed that the participants to be selected by using purposive sampling techniques which included a voluntarily selection. These participants were selected as they have already felt the feeling of anxiety about their occupation as teacher candidates. The demographic information of the participants is included in Table 1.

**Table 1.** Demographic Information of the Participants in the Study

Features	1	2	3	4	5	6	7	Total
Gender	Female	Male						
	<i>n</i> 352	105						457
	% 77.0	23.0						100
University	Zonguldak							
	Bülent Ecevit University	Düzce University	Bartın University					
	<i>n</i> 126	142	189					457
	% 27.6	31.1	41.4					100
University Level	Freshmen	Sophomore	Junior	Senior				
	<i>n</i> 88	76	224	69				457
	% 19.3	16.6	49.0	15.1				100
Department	Elementary	Counseling	Math	Turkish	Pre-School	Special Education	Science	
	<i>n</i> 38	194	111	31	1	66	16	457
	% 8.3	42.5	24.3	6.8	.2	14.4	3.5	100

### 3.2. Data Collection Tools

A measurement tool was used for data collection. It took about 15-20 minutes on average to implement the data collection tool. For data collection, Occupational Anxiety Inventory for Teacher Candidates (OAI) was used in the study.

*Occupational Anxiety Inventory for Teacher Candidates (OAI):* The scale developed by Cabi and Yalçınalp (2013) includes 45 items and consists of eight sub-dimensions. The scale is answered according to a five-point Likert-type scale (1: I am very worried- 5: I am not worried). Sub-dimensions of the scale included task-centered anxiety, economic-social-centered anxiety, student-communication-centered anxiety, colleague-and parent-centered anxiety, personal development-centered anxiety, assignment-centered anxiety, compliance-centered anxiety, and school management-centered anxiety. The Cronbach Alpha reliability coefficients of the subscales were respectively as 94, 0.88, 0.90, 0.82, 0.85, 0.82, 0.77 and 0.67. The reliability coefficient for the whole scale was found to be 0.95.

### 3.3. Data Collection and Analysis

For the field study, first of all, an application was made to the Human Research Ethics Committee of Zonguldak Bülent Ecevit University and necessary approvals were sought. After the approval, the data collection tool was implemented to the participants located at three different universities.

After the data were collected from the field, it was analyzed with appropriate techniques. Accordingly, SPSS (Statistical Package for the Social Sciences) was used for the analysis of quantitative data. The answers to the descriptive questions were presented through frequency, mean and standard deviation values, as well as tables or figures. In addition, independent sample t-test and One-Way Analysis of Variance (ANOVA) were used to detect significant differences between groups.

## 4. FINDINGS

In this part, the results are presented according to mean scores of teacher candidates on their occupational anxiety level (Table 2). The results are presented based on the data collection instrument and its eight sub-scales.

**Table 2.** Mean and Standard Deviation Values of Professional Anxiety and Its Sub-Dimensions

Variables	n	Min	Max	Mean	SD
Occupational Anxiety General	457	1.13	5.00	3.36	.79
Task-Centered Anxiety	457	1.00	5.00	3.66	.95
Economic-Social-Centered Anxiety	457	1.00	5.00	2.84	.97
Student-Communication Centered Anxiety	457	1.00	5.00	3.34	1.10
Colleague- and Parent-Centered Anxiety	457	1.00	5.00	3.72	.99
Personal Development-Centered Anxiety	457	1.00	5.00	3.44	1.21
Assignment-Centered Anxiety	457	1.00	5.00	2.58	1.12
Compliance-Centered Anxiety	457	1.00	5.00	3.34	1.12
School Management-Centered Anxiety	457	1.00	5.00	3.35	.99

The findings based on the Occupational Anxiety Scale showed that the sub-scales had different mean values. According to the results, teacher candidates had the highest mean score on task-centered anxiety ( $M = 3.66$ ,  $SD = .95$ ) and the lowest score on assignment-centered anxiety ( $M = 2.58$ ,  $SD = 1.12$ ).

The mean differences between genders of teacher candidates based on occupational anxiety were examined and the findings are outlined in Table 3.

**Table 3. Independent Sample T-Test Results for Gender Variable**

Variables	Gender	N	X	S	t	p
Occupational Anxiety General	Female	352	3.29	.78	-3.44	.00
	Male	105	3.59	.78		
Task-Centered Anxiety	Female	352	3.61	.94	-2.04	.04
	Male	105	3.82	.96		
Economic-Social-Centered Anxiety	Female	352	2.79	.95	-2.03	.04
	Male	105	3.01	1.00		
Student-Communication Centered Anxiety	Female	352	3.22	1.07	-4.44	.00
	Male	105	3.75	1.08		
Colleague- and Parent-Centered Anxiety	Female	352	3.62	1.00	-3.88	.00
	Male	105	4.04	.88		
Personal Development-Centered Anxiety	Female	352	3.34	1.20	-3.29	.00
	Male	105	3.78	1.20		
Assignment-Centered Anxiety	Female	352	2.47	1.08	-4.06	.00
	Male	105	2.97	1.17		
Compliance-Centered Anxiety	Female	352	3.30	1.08	-1.39	.16
	Male	105	3.47	1.23		
School Management-Centered Anxiety	Female	352	3.36	.99	.22	.82
	Male	105	3.33	.99		

The mean differences between genders of teacher candidates based on occupational anxiety, were evaluated. The results showed that there were significant differences on occupational anxiety general ( $t = -3.44$ ;  $p = .00$ ), task-centered anxiety ( $t = -2.04$ ;  $p = .04$ ), economic-social-centered anxiety ( $t = -2.03$ ;  $p = .04$ ), student-communication centered anxiety ( $t = -4.44$ ;  $p = .00$ ), colleague- and parent-centered anxiety ( $t = -3.88$ ;  $p = .00$ ), personal development-centered anxiety ( $t = -3.29$ ;  $p = .00$ ), and assignment-centered anxiety ( $t = -4.06$ ;  $p = .00$ ).

The mean differences between university levels of teacher candidates based on occupational anxiety were investigated and the findings are presented in Table 4.

**Table 4.** *Anova Test Results for University Level Variable*

Variables	Groups	Sum of Squares	df	Mean Squares	F	p
Occupational Anxiety General	Within group	5.81	3	1.93	3.10	.02
	Between groups	283.05	453	.62		
Task-Centered Anxiety	Within group	16.00	3	5.33	6.09	.00
	Between groups	396.39	453	.87		
Economic-Social-Centered Anxiety	Within group	.55	3	.18	.19	.90
	Between groups	429.63	453	.94		
Student-Communication Centered Anxiety	Within group	6.11	3	2.03	1.69	.16
	Between groups	546.34	453	1.20		
Colleague- and Parent-Centered Anxiety	Within group	8.25	3	2.75	2.83	.03
	Between groups	439.54	453	.97		
Personal Development-Centered Anxiety	Within group	14.76	3	4.92	3.37	.01
	Between groups	661.37	453	1.46		
Assignment-Centered Anxiety	Within group	8.58	3	2.86	2.27	.07
	Between groups	569.42	453	1.25		
Compliance-Centered Anxiety	Within group	2.80	3	.93	.73	.53
	Between groups	574.02	453	1.26		
School Management-Centered Anxiety	Within group	10.38	3	3.46	3.53	.01
	Between groups	444.09	453	.98		

The mean differences between university levels of teacher candidates based on occupational anxiety were examined. The results showed that there were significant differences on colleague- and parent-centered anxiety ( $F_{3,453} = 2.83$ ;  $p = .03$ ), personal development-centered anxiety ( $F_{3,453} = 3.37$ ;  $p = .01$ ), and school management-centered anxiety ( $F_{3,453} = 3.53$ ;  $p = .01$ ).

The mean differences between departments of teacher candidates based on occupational anxiety were investigated and the findings are presented in Table 5.



**Table 5.** *Anova Test Results for the Department Variable*

Variables	Groups	Sum of Squares	df	Mean Squares	F	p
Occupational Anxiety General	Within group	3.85	6	.64	1.01	.41
	Between groups	285.02	450	.63		
Task-Centered Anxiety	Within group	9.52	6	1.58	1.77	.10
	Between groups	402.87	450	.89		
Economic-Social-Centered Anxiety	Within group	6.51	6	1.08	1.15	.33
	Between groups	423.66	450	.94		
Student-Communication Centered Anxiety	Within group	7.13	6	1.19	.98	.43
	Between groups	545.31	450	1.21		
Colleague- and Parent-Centered Anxiety	Within group	3.59	6	.59	.60	.72
	Between groups	444.20	450	.98		
Personal Development-Centered Anxiety	Within group	12.29	6	2.05	1.38	.21
	Between groups	663.83	450	1.47		
Assignment-Centered Anxiety	Within group	18.40	6	3.06	2.46	.02
	Between groups	559.60	450	1.24		
Compliance-Centered Anxiety	Within group	18.15	6	3.02	2.43	.02
	Between groups	558.66	450	1.24		
School Management-Centered Anxiety	Within group	19.72	6	3.28	3.40	.00
	Between groups	434.75	450	.96		

The mean differences between departments of teacher candidates based on occupational anxiety were examined. The results showed that there were significant differences on assignment-centered anxiety ( $f_{3,453} = 2.46$ ;  $p = .02$ ), compliance-centered anxiety ( $f_{3,453} = 2.43$ ;  $p = .02$ ), and school management-centered anxiety ( $F_{3,453} = 3.40$ ;  $p = .00$ ).

The mean differences between the universities of teacher candidates based on occupational anxiety were investigated and the findings are presented in Table 6.

**Table 6.** *Anova Test Results for the University Variable*

Variables	Groups	Sum of Squares	df	Mean Squares	F	p
Occupational Anxiety General	Within group	.81	2	.40	.64	.52
	Between groups	288.05	454	.63		
Task-Centered Anxiety	Within group	2.53	2	1.26	1.40	.24
	Between groups	409.86	454	.90		
Economic-Social-Centered Anxiety	Within group	.13	2	.06	.07	.93
	Between groups	430.05	454	.94		
Student-Communication Centered Anxiety	Within group	2.68	2	1.34	1.10	.33
	Between groups	549.77	454	1.21		
Colleague- and Parent-Centered Anxiety	Within group	.28	2	.14	.14	.86
	Between groups	447.50	454	.98		
Personal Development-Centered Anxiety	Within group	2.97	2	1.48	1.00	.36
	Between groups	673.16	454	1.48		
Assignment-Centered Anxiety	Within group	5.11	2	2.55	2.02	.13
	Between groups	572.89	454	1.26		
Compliance-Centered Anxiety	Within group	4.74	2	2.37	1.88	.15
	Between groups	572.08	454	1.26		
School Management-Centered Anxiety	Within group	2.25	2	1.12	1.13	.32
	Between groups	452.22	454	.99		

The mean differences between universities of teacher candidates based on occupational anxiety were examined. The findings suggested that there were no meaningful differences on occupational anxiety of teacher candidates based on their universities.

## 5. RESULTS AND DISCUSSION

This study aimed to examine the occupational anxiety levels of teacher candidates during the COVID-19 pandemic process. In such perspective firstly the study investigated the occupational anxiety level of teacher candidates. It was found that these candidates are mostly worried about the tasks that are assigned to them. It may be claimed that the candidates have a fear of not being able to completing the assigned tasks (Can, 2020). The second research question of the study focused on the significant difference of occupational anxiety level based on teacher candidates' genders. It was determined that in general, there was a significant difference of occupational anxiety level based on teacher candidates' genders. According Özer

and Suna (2020), this approach may not always be the case as the differences may be connected mainly to the candidates' age rather than their gender.

The third research question was about the significant difference of occupational anxiety level based on teacher candidates' university levels. It seemed that there was a significant difference of occupational anxiety level based on teacher candidates' university levels. Especially senior students feel more stress about whether they will be appointed for a job after school than their peers in lower levels (Sarı & Nayır, 2020).

The fourth question included a problem about the significant difference of occupational anxiety level based on teacher candidates' departments. It was suggested that such significant differences were only consistent on some of the sub-scales including assignment-centered anxiety, compliance-centered anxiety, and school management-centered anxiety. The type of departments may be an important indicator in terms of anxiety level of the teacher candidates. Basically the departments with better occupation appointment rates create lower anxiety levels (Frenzel et al., 2016). The last research question of the study was about the significant difference of occupational anxiety level based on teacher candidates' university. The findings suggested that there was no significant difference of occupational anxiety level based on teacher candidates' university.

## 6. RECOMMENDATIONS

Some recommendations can be made in the context of the results of this study. Studies can be conducted with sample groups that include larger groups of participants in the future. From the practitioner's point of view, it can be ensured that students learn in a more democratic and peaceful environment by exhibiting approaches that reduce the level of stress in classroom settings. Policy makers, on the other hand, should make arrangements to make teacher appointments more comprehensive and equitable.

## 7. ABOUT THE AUTHOR(S)

**Seyithan Demirdağ** is an Associate Professor in the Department of Educational Sciences. His study topics include teacher education, multiculturalism, student diversity, and leadership.

**Mürşide Ceren Aksal** is an undergraduate student in the Department of Special Education.

## 8. References

- Akpınar, B. (2013). Öğretmen adaylarının stres nedenleri [The causes of stress of teacher candidates]. *Kalem Academy*, 147-173.
- Bozdağ, F. (2020). Pandemi sürecinde psikolojik sağlamlık [Psychological resilience during pandemic]. *Electronic Turkish Studies*, 15(6), 247-257.
- Bozdam, A., & Taşgın, Ö. (2011). Öğretmen adaylarının mesleki kaygı düzeylerinin bazı değişkenler açısından incelenmesi [Examination the occupational anxiety levels of master candidates according to some variables]. *Türk Spor ve Egzersiz Dergisi*, 13(1), 44-53.

Bozkurt, Y., Zeybek, Z., & Aşkın, R. (2020). COVID-19 pandemisi: Psikolojik etkileri ve terapötik müdahaleler [COVID-19 pandemic: psychological effects and therapeutic interventions]. *İstanbul Ticaret Üniversitesi Sosyal Bilimler Dergisi*, 19(37), 304-318.

Cabı, E., & Yalçınalp, S. (2013). Öğretmen adaylarına yönelik mesleki kaygı ölçeği (MKÖ): Geçerlik ve güvenilirlik çalışması [Occupational anxiety scale for prospective teachers: a study on validity and reliability]. *Hacettepe University Journal of Education*, 44(44), 85-96.

Can, E. (2020). Coronavirüs (COVID-19) pandemisi ve pedagojik yansımaları: Türkiye’de açık ve uzaktan eğitim uygulamaları. *AUAd*, 6(2), 11-53.

Creswell, J. W. (2007). *Qualitative inquiry and research design choosing among five approaches*. Sage Publications.

Dikmen, A. U., Kına, M. H., Özkan, S., & İlhan, M. N. (2020).. COVID-19 epidemiyolojisi: Pandemiden ne öğrendik [Epidemiology of COVID-19: What we learn from pandemic]. *Journal of Biotechnology and Strategic Health Research*, 4, 29-36.

Dursun, S., & Aytaç, S. (2009). Üniversite öğrencileri arasında işsizlik kaygısı. *Uludağ Üniversitesi İktisadi ve İdari Bilimler Fakültesi Dergisi*, 28(1), 71-81.

Dursun, S., & Karagün, E. (2012). Öğretmen adaylarının mesleki kaygı düzeylerinin incelenmesi: Kocaeli Üniversitesi Beden Eğitimi ve Spor Yüksekokulu son sınıf öğrencileri üzerine bir araştırma [Assessment of occupational anxiety levels of preservice teachers: a research on the students in their final year at the school of physical education and sports at Kocaeli University]. *Kocaeli University Journal of Social Sciences*, 24, 93-112.

Frenzel, A. C., Pekrun, R., Goetz, T., Daniels, L. M., Durksen, T. L., Becker-Kurz, B., & Klassen, R. M. (2016). Measuring teachers’ enjoyment, anger, and anxiety: The Teacher Emotions Scales (TES). *Contemporary Educational Psychology*, 46, 148-163.

Gresham, G. (2018). Preservice to inservice: Does mathematics anxiety change with teaching experience?. *Journal of Teacher Education*, 69(1), 90-107.

Karasar, N. (2012). *Bilimsel araştırma yöntemi [Scientific research method]*. Nobel Publishing. Ankara.

Kaya, M., & Varol, K. (2004). İlahiyat fakültesi öğrencilerinin durumluk-sürekli kaygı düzeyleri ve kaygı nedenleri (Samsun örneği) [The levels and reasons of state-trait anxiety of the students of the faculty of theology (The case of Samsun)]. *Ondokuz Mayıs University Review of the Faculty of Divinity*, 17(17), 31-63.

Leite, H., Hodgkinson, I. R., & Gruber, T. (2020). New development: ‘Healing at a distance’- telemedicine and COVID-19. *Public Money & Management*, 40(6), 483-485.

Memikoğlu, O., & Genç, V. (2020). *COVID-19*. E-Book, Ankara University Printing Houses: Ankara.

Mizala, A., Martínez, F., & Martínez, S. (2015). Pre-service elementary school teachers' expectations about student performance: How their beliefs are affected by their mathematics anxiety and student's gender. *Teaching and Teacher Education*, 50, 70-78.

Özer, M., & Suna, H. E. (2020). Covid-19 pandemic and education. *Anatomy of global society: In the future of man and society*, 171-192. Turkish Academy of Sciences.

Peele, M., & Wolf, S. (2021). Depressive and anxiety symptoms in early childhood education teachers: Relations to professional well-being and absenteeism. *Early Childhood Research Quarterly*, 55, 275-283.

Sarı, T., & Nayır, F. (2020). Pandemi dönemi eğitim: sorunlar ve fırsatlar [Education in the pandemic period: Challenges and opportunities]. *Turkish Studies*, 15(4), 959-975.

Şanlı Kula, K., & Saraç, T. (2016). Üniversite öğrencilerinin gelecek kaygısı [The future anxiety of the university students]. *Mustafa Kemal University Journal of Social Sciences Institute*, 13(33), 227-242.

Talidong, K. J. B., & Toquero, C. M. D. (2020). Philippine teachers' practices to deal with anxiety amid COVID-19. *Journal of Loss and Trauma*, 25(6-7), 573-579.

Tümerdem, R. (2007). Dicle Üniversitesi eğitim fakültesi ve fen-edebiyat fakültesi kimya son sınıf öğrencilerinin kaygılarını etkileyen etmenler [The factors affecting Dicle University education faculty and science faculty students' anxiety]. *Electronic Journal of Social Sciences*, 6(20), 32-45.

World Health Organization. (2020, March 18). Mental health and psychosocial considerations during the COVID-19 outbreak. <https://www.who.int/docs/default-source/coronaviruse/mental-health-considerations.pdf>.