

## INVESTIGATION OF THE ATTITUDES DISTANCE EDUCATION OF THE FACULTY OF SPORT SCIENCE STUDENTS IN THE COVID-19 PERIOD

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### ABSTRACT

In this study, it was aimed to examine the attitudes of the Faculty of Sport Sciences Students education in the period of COVID-19 according to gender, class, regular internet access status, courses attendance status, the device in which the courses were followed, the environment to attend courses and viewing distance education useful variables. In the research general survey model was used. Participants consisted of 98 volunteer students who were selected according to the random sampling method studying in the Department of Exercise and Sport Education for Disabled People at Malatya Inonu University Faculty of Sport Sciences. In the research The Attitude Scale for E-learning was used. The data analysis of the research was carried out in SPSS 22.0 statistics package program for Windows. Normality distribution was done by the Kolmogorov-Smirnov normality test. Differences between groups were determined using independent sample t-test (Independent Samples T-Test) and one-way analysis of variance (One-way ANOVA) and Post-Hoc LSD tests. Significance was accepted as ( $p < 0.05$ ). As a result of the research, it has been observed that the attitudes of the students of the Faculty of Sport Sciences towards distance education have significant differences according to gender, regular internet access status, the environment of attending classes, discomfort while listening to courses and finding distance education useful. The results of the research revealed that the students found the distance education applied in COVID-19 period beneficial.

**Keywords:** COVID-19, pandemic, remote education, students, faculty of sports sciences.

### INTRODUCTION

The coronavirus is an epidemic that emerged in December 2019 in Wuhan, China, with the an increase in chronic pneumonia cases. The symptoms are seen afterward and the results of laboratory tests were defined as the new coronavirus 2019 (COVID-19) (Huang et al., 2020). Considered an epidemic by the World Health Organization (WHO), COVID-19 has significantly affected daily life around the world. Practices and restrictions brought in order to slowdown and control the spread of the epidemic have rapidly changed people's daily lifestyles in many areas such as nutrition, movement, consumption, habits, education and training (Korkut Gencalp, 2020). The COVID-19 pandemic has been effective in many areas. One of the are as where the epidemic is effective is education.

Due to the COVID-19 outbreak, formal education has been suspended in 192 countries. Around 1.2 billion students and 63 million teachers worldwide have been directly affected by the epidemic (Duşkun, 2020; UNESCO, 2020). The suspension of formal education due to the epidemic has brought distance education to the agenda all over the world. Distance education has been put into use as the easiest solution to ensure sustainability in education during the epidemic period. With the developing technology, the widespread use of systems such as MOOC shows that the distance education model is already accepted as a usable education model. At this point, agreements have been made between large-scale distance education platforms such as Coursera, Udemy, Udacity, Edex and universities, and such distance education applications have become widespread around the world (Telli & Altun, 2020). To use such systems previously used more functionally during the epidemic period, countries have quickly completed their preparations and started distance education.

During the epidemic period, educational institutions in most countries carry out their activities through distance education (ETF, 2020; Reimers, 2020) For example, the Chinese higher education system has switched to a comprehensive distance education application from kindergarten students to doctoral students in distance education (Lau, Yang & Dasgupta, 2020). More than 100 universities in the USA, including universities such as Ohio State, Harvard, Duke, Columbia, Tufts, have switched from formal education to distance education (Pfleger, 2020). In Italy, one of the countries where COVID-19 is most effective, March 4 Education in schools was suspended temporarily in 2020 (Togoh, 2020). Also, 2000 teachers were included in the distance education seminar with the distance education portal created (Kotasova & Isaac, 2020; Benu, 2020). Similar is the case in Turkey.

Faced COVID-19 pandemic now than in European countries, Turkey is among the countries at the earliest measures against the epidemic. Quickly, methods of combating the virus in the world were evaluated. As a result of the evaluations made, the schools affiliated with the Ministry of National Education were closed on March 11, 2020, and distance education was started after a one-week preparation period. In higher education, education was suspended for 3 weeks first, and then it was decided to continue the 2020 spring semester with distance education (CoHE, 2020). Accordingly, the decisions and measures taken regarding the epidemic in higher education institutions in other countries were examined and plans were made considering the existing capacity of CoHE. In line with the planning made, universities with suitable infrastructure started distance education on March 23, 2020. Within the scope of distance education, theoretical courses will be given first, and it has been decided that practical courses will be given at the most appropriate time in line with the calendar to be determined by the universities (Telli & Altun, 2020).

One of the important changes made in the field of higher education recently is the use of technology to improve learning. In addition to traditional campus-based courses, distance education programs supported by digital technology infrastructure are the biggest indicator of this change. (Daniels & Thistlethwaite, 2016). Many universities now offer distance education courses and programs to meet the various educational needs of students and to keep up with developing technology (Fidalgo, et al., 2020). This type of training is handled in two ways, synchronous and asynchronous. In synchronous courses, students and teachers can communicate online in a virtual classroom environment. In asynchronous courses, the parties can communicate their requests to each other on the subjects related to the course as in the classroom environment, and they can ask questions, answer and exchange information with each other. In asynchronous courses, the student can access the course via the internet from anywhere at any time without the obligation to communicate online, video, audio recording etc. related to the pre-loaded course. Can access materials (Sercemeli & Kurnaz, 2020). In the distance education system, students have to continue their education on their own, causing them to experience problems such as personal and social loneliness, inability to communicate and interact adequately (Ekici, 2003). There should be an appropriate instructor who can provide accurate and effective communication, effective and efficient information transfer (Sercemeli & Kurnaz, 2020). It is among the questions that are wondering how the rapid transition to distance education due to COVID-19 has an impact on students caught unprepared for this education method. For this reason, it is seen that the effects of distance education applied in the epidemic period worldwide on students are investigated.

In the literature, researches conducted by Bao (2020), Abbasi et al., (2020), Anca and Cosmina (2020), Telli and Altun (2020), Sercemeli and Kurnaz (2020) on the effects of distance education during the COVID-19

period have been found. As in all the world there is a sudden transition to distance education students in Turkey has led to the availability and experiencing various problems and challenges on issues such as adaptation. In universities where mostly formal education is given, what kind of effect the sudden transition to distance education has on the adaptation and adaptation of students is among the subjects that are curious and need to be researched. Also, it is useful to know whether the infrastructure used for distance education is sufficient for the new situation and how possible problems that may arise in issues such as the availability of internet access affect students.

In distance education, students' prejudices and attitudes towards this education type may differ. It is thought that it is scientifically important to learn the attitudes of students towards distance education, since students who have received formal education and who have adopted this form of education switch to distance education suddenly regardless of their technology experience. It is especially useful to learn about the attitudes of students who take applied courses in their field in the Faculty of Sports Sciences towards distance education during the epidemic period. Therefore, the main purpose of this study is to learn the attitudes of the undergraduate students of the Faculty of Sport Sciences Department of Exercise and Sports Education for the Disabled towards the distance education applied during the COVID-19 period and to make suggestions by making evaluations in this direction. During the COVID-19 epidemic, it is thought that it is important to learn the opinions of the students who receive compulsory distance education about the distance education system and distance education courses and to contribute to the literature. Thus, it is thought that conducting such researches will be beneficial to be more prepared and experienced to continue education in the face of possible sudden situations.

Accordingly, the sub-problems of the research are as follows:

1. Does the perception of the students of the Faculty of Sports Sciences towards distance education during the COVID-19 period differ by gender?
2. Does the perception of the students of the Faculty of Sports Sciences towards distance education during the COVID-19 period differ according to the class status?
3. Does the perception of the students of the Faculty of Sports Sciences towards distance education during the COVID-19 period differ according to internet Access status?
4. Do the perceptions of the students of the Faculty of Sports Sciences towards distance education during the COVID-19 period differ according to their participation in distance education courses?
5. Do the perceptions of the students of the Faculty of Sport Sciences towards distance education during the COVID-19 period differ according to the device on which the distance education course is listened?
6. Do the perceptions of the students of the Faculty of Sports Sciences towards distance education during the COVID-19 period differ according to the environment where the distance education course is listened?
7. Does the perception of the students of the Faculty of Sports Sciences towards distance education during the COVID-19 period differ according to their status of seeing distance education as beneficial?

## **METHODS**

In this section, the research model, participants, data collection and analysis are included.

### **Research Model**

In this research, the general survey model was used following the descriptive research method, one of the quantitative research methods. In this research, "Faculty of Sports Sciences Students "Attitudes towards Distance Education in the COVID-19 Period" in terms of various variables general survey model was used due to the attempt to examine. A survey model is a research approach that aims to describe a past or present situation as it exists (Karasar, 2018).

## Participants

In this research random sample method was used. In the random sampling method the sample's power to represent the universe is very high. By means of this method, valid for the universe creation of highly representative samples for which generalizations can be made is targeted. In this sampling method, all units in the universe have an equal and independent probability of sampling. In other words, the probability of being selected for all individuals is the same and an individual's choice affects the choice of other individuals (Karasar, 2018). For these reasons, in this research simple random sampling model was preferred. The universe of the research consists of the Students of the Faculty of Sports Sciences. The sample of the study is the students of Malatya Inonu University, Faculty of Sport Sciences, Department of Exercise and Sports Education for the Disabled. Participants consist of a total of 98 people, 59 male and 41 female, who voluntarily participated in the research. Participants' ages are between 18 (years) and 29 (years).

## Data Collection and Analysis

Before the data collection process, the permission required for the implementation of the scale was obtained from Osmaniye Korkut Ata University Scientific Research and Publication Ethics Board dated 27/07/2020-20391. The scale was administered to students through the electronic questionnaire application Whatsapp communication and information sharing groups, via Google Forms due to the epidemic. Participating students were given detailed information about the research topic through the communication and information sharing group. The survey application was completed by 98 volunteer students. In the research SPSS 22.0 statistics program for Windows® was used for data analysis. The distribution of normality was done with the Kolmogorov-Smirnov normality test. Differences between groups were determined using the Independent Samples T-Test, one-way analysis of variance (One-way ANOVA) and Post-Hoc LSD tests. LSD test is a post-hoc statistic whose choice is considered undesirable if the number of groups to determine the difference (k means) is more than 3 (Efe et al., 2000; Kayri, 2009). Mathematically, it is highly vulnerable to type I error. Because, although Type I error level ( $\alpha$ ) is chosen as 5%, the amount of error per group increases as the number of groups increases. Again, according to the example given by Efe et al. (2000) for LSD, while  $\alpha_{\text{group}} = 0.05$ , the amount of error per group for the mean of 10 groups increases to  $\alpha_{\text{group}} = 0.3693$  [=  $(1 - (1 - \alpha)^{k-1}) = (1 - (1 - 0.05)^{10-1}) = 0.3693$ ]. That is, as the number of groups increases, the amount of  $\alpha$  error also increases. Therefore, LSD multiple comparison statistics should not be used if the number of groups compared is high (Kayri, 2009). In research significance was accepted as  $p < 0.05$ .

**Table 1.** Normality Distributions of the Score Values of the Attitude Scale Towards E-Learning

Parameter / Unit	Statistics	Sd.	p	Flatness	Distortion
Scale Total	,768	98	,163	,401	-,687
Ability to E-Learning	,675	98	,141	,698	-,872
Avoiding E-Learning	,881	98	,154	,562	-,745

\* $p < 0.05$

In Table 1, it was determined that the scale total score of the Attitude Scale towards E-Learning obtained from the students of the Faculty of Sports Sciences and all sub-dimension scores of the scale have a normal distribution according to the results of Kolmogorov-Smirnov normality distribution test and kurtosis-skewness values ( $p > 0.05$ ).

## The Scale

“Attitude Scale Towards E-Learning” was used in the study.

### Attitude Scale Towards E-Learning

The scale developed by Wilkinson et al., (2010) was adapted into Turkish by Haznedar (2012). The scale has a five-point Likert type structure and consists of 20 items and two sub-dimensions ( $\alpha = .93$ ). The first sub-dimension was defined as “disposition to e-learning” and the second sub-dimension as “avoiding e-learning”. The items “E-learning interests me” for the first sub-dimension and “E-learning is unnecessary” for the second sub-dimension can be given as examples. In the analyzes made during the adaptation to Turkish, the Cronbach Alpha coefficient value for the reliability estimation of the scale was determined as 0.93 for the EOT sub-dimension and 0.84 for the IPC sub-dimension. The total (for 20 items) Cronbach Alpha coefficient value of the EOT scale was found to be 0.93. Scale reliability coefficients obtained from this study were found as E-Learning (Scale Total), 838 E-Learning Tendency (Sub-Dimension);, 847 Avoiding E-Learning (Sub-Dimension), .83.

### Exploratory Factor Analysis (EFA)

For the construct validity of the E-Learning Attitude Scale form, EFA was first performed. To perform this analysis, the KMO (Kaiser-Meyer-Olkin Measure of Sampling Adequacy) test, which tests the adequacy of the sample, was examined first. KMO value was found to be .81. According to Buyukozturk (2002), since this value is greater than .70, it has been concluded that factor analysis can be made on these data. Secondly, by looking at the Bartlett Sphericity test ( $\chi^2 = 4165.70$ ,  $p = .001$ ), it was determined that the data obtained were suitable for factor analysis as they differed significantly (Buyukozturk, 2002). In the factor analysis, varimax axis rotation was performed, with the eigenvalues of 20 items being 1, primarily for principal component analysis. After Varimax rotation, 20 items were gathered under two factors with an eigenvalue greater than 1. In the scale showing the two factor structure, the first of the factors explained 37,806% of the total variance, the second being 20,101%, a total of 57,907%. As a result of the validity studies, it was found that the scale has a two-factor structure. As a result of factor analysis with an eigenvalue of 1, the number of factors in the scale is two. In this respect, a two-factor structure related to the scale was preferred. Detailed results of the exploratory factor analysis are given in Table 2, Table 3 and Table 4.

**Table 2.** KMO and Bartlett Test Results

<b>Kaiser-Meyer-Olkin Sampling Adequacy</b>		0,810
	Approximate Chi-square	4165.70
<b>Bartlett Test of Sphericity</b>	SD	98
	P	,001

**Table 3.** Exploratory Factor Analysis Variance Explanation Ratio Results

Matter	Initial Eigenvalues			Rotated Factor Loads		
	Total	Variance %	Cumulative %	Total	Variance %	Cumulative %
<b>M1</b>	8,588	37,806	46,896	6,524	32,456	22,839
<b>M2</b>	5,778	20,101	57,907	4,875	19,889	57,907
<b>M3</b>	,987	8,735	58,992			
<b>M4</b>	,947	7,853	65,945			
<b>M5</b>	,862	6,325	70,869			
<b>M6</b>	,787	5,112	71,874			
<b>M7</b>	,730	4,894	73,985			

<b>M8</b>	,711	4,393	75,353
<b>M9</b>	,668	4,051	76,786
<b>M10</b>	,566	3,472	78,575
<b>M11</b>	,534	3,276	81,801
<b>M12</b>	,500	3,113	82,525
<b>M13</b>	,487	3,064	84,895
<b>M14</b>	,455	2,779	87,693
<b>M15</b>	,425	2,582	90,239
<b>M16</b>	,384	2,472	92,997
<b>M17</b>	,354	2,139	94,856
<b>M18</b>	,319	1,920	96,786
<b>M19</b>	,290	1,651	98,577
<b>M20</b>	,246	1,573	100,000

**Table 4.** Rotated Factor Analysis Results

<b>Factor Name</b>	<b>Matter</b>	<b>Factor 1</b>	<b>Factor 2</b>
<b>Ability to E-Learning</b>	M6	<b>,811</b>	,341
	M12	<b>,795</b>	,351
	M17	<b>,781</b>	,251
	M15	<b>,765</b>	,114
	M5	<b>,748</b>	,068
	M17	<b>,722</b>	,221
	M16	<b>,715</b>	,147
	M9	<b>,686</b>	,201
	M20	<b>,674</b>	,054
	M7	<b>,657</b>	,074
<b>Avoiding E-Learning</b>	M8	<b>,244</b>	<b>,687</b>
	M11	<b>,201</b>	<b>,674</b>
	M18	<b>,157</b>	<b>,666</b>
	M4	<b>,149</b>	<b>,652</b>
	M1	<b>,068</b>	<b>,644</b>
	M14	<b>,100</b>	<b>,623</b>
	M19	<b>,164</b>	<b>,614</b>
	M2	<b>,177</b>	<b>,592</b>
	M3	<b>,080</b>	<b>,583</b>
	M10	<b>,099</b>	<b>,571</b>

## FINDINGS

All findings of the research were given in tables in detail. The general attitude values of participating students to e-learning according to their gender during the epidemic period were given in Table (5).

**Table 5.** The General Attitude Values of the Students towards E-Learning According to Their Gender During the Epidemic Period

Parameter	Group	n	$\bar{X}$	Ss.	t	Sd.	P
Ability to E-Learning	Male	59	22,6	4,2	-4,778*	98	,000*
	Female	41	30,4	3,6			
Avoiding E-Learning	Male	59	32,6	4,4	-4,665*	98	,000*
	Female	41	23,5	5,1			

\*p<0.05

According to Table 5; In the epidemic period, a significant difference was found between the general attitudes of the students who participated in the study towards e-learning and their attitudes towards both e-learning and avoidance of e-learning ( $p < 0.05$ ). In these differences determined; It was determined that female students had higher values than male students in the e-learning disposition sub-dimension, and male students had higher values than female students in the e-learning avoidance sub-dimension ( $p < 0.05$ ). The general attitude values of the participating students according to their regular internet access during the epidemic period were given in table (6).

**Table 6.** The General Attitude Values of the Students According to their Regular Internet Access During the Epidemic Period

Parameter	Group	n	$\bar{X}$	Ss.	t	Sd.	p
Ability to E-Learning	Yes	64	31,6	3,2	3,698*	98	,001*
	No	36	24,3	4,1			
Avoiding E-Learning	Yes	64	18,3	5,2	4,115*	98	,000*
	No	36	27,2	5,3			

\*p<0.05

According to Table 6; A significant difference was found between the general attitudes towards e-learning according to their regular internet Access status during the epidemic period of the students participating in the study, and their attitudes towards both e-learning tendency and avoidance of e-learning ( $p < 0.05$ ). In these differences determined; In the e-learning disposition sub-dimension, it was determined that students with regular internet access had higher values than students who did not have regular internet access, and students who did not have regular internet access in the e-learning sub-dimension had higher values than students with regular internet access ( $p < 0.05$ ). The attitudes of participating students towards e-learning according to the environment in which they listened to distance learning courses during the epidemic period were given in Table (7).

**Table 7.** General Attitude Values Towards E-Learning According to The Environment in which Students Attend the Courses in E-Environment During the Epidemic Period.

	No	Group	n	$\bar{X}$	Ss.	p	F	Sd.	Post-Hoc (LSD)
Ability to E-Learning	1	In a family home environment	33	22,6	3,1	,000*	5,114*	2	2>1*(p= ,000) 2>3*(p= ,000) 3>1*(p= ,000)
	2	Home alone	39	30,4	3,0				
	3	others	28	27,6	3,5				
Avoiding E-Learning	1	In a family home environment	33	31,2	3,8	,000*	6,004*	2	1>2*(p= ,000) 1>3*(p= ,001) 3>2*(p= ,000)
	2	Home alone	39	23,3	3,4				
	3	others	28	26,4	3,3				

\*p<0.05

According to Table 7; A significant difference was determined from the general attitudes of the students participating in the study, according to their environment of participating in distance education courses during the epidemic period, from both the tendency to e-learning and their attitudes towards avoiding e-learning ( $p < 0.05$ ). In this difference determined; In the e-learning sub-dimension, students who participate in courses alone at home have higher values than those in the family environment and other living environments, and students in other living environments have higher values than students who attend courses in the family environment at home, and in the sub-dimension of avoiding e-learning, It was determined that the students who attended the courses in other living environments than the students who attended the courses and the students who attended the courses alone at home, the students in the other living environment have higher values than the students living alone at home ( $p < 0.05$ ). The general attitude values of participating students towards e-learning according to their disturbance while attending distance education courses during the epidemic period were given in table (8).

**Table 8.** The General Attitude Values of Students Towards E-Learning According to Their Disturbance While Attending Distance Education Courses During The Epidemic Period.

Parameter	Group	n	$\bar{X}$	Ss.	t	Sd.	p
Ability to E-Learning	Yes	51	24,8	3,8	3,996*	98	,000
	No	49	30,9	4,2			
Avoiding E-Learning	Yes	51	19,3	5,9	4,538*	98	,000
	No	49	26,1	5,1			

\*p<0.05

According to Table 8; A significant difference was found between the general attitudes towards e-learning and both e-learning tendency and avoidance attitudes towards e-learning according to the state of being disturbed while attending the distance education courses applied during the epidemic period of the students participating in the study ( $p < 0.05$ ). In these differences determined; In the e-learning sub-dimension, students who were not disturbed while participating in distance education courses had higher values than



students who were disturbed while participating in distance education courses, and in the sub-dimension of e-learning avoidance, students who were disturbed while attending distance education courses had higher values than students who were not disturbed while participating in distance education courses. It was observed ( $p < 0.05$ ). The general attitudes of participating students towards e-learning according to their status of finding distance learning useful during the epidemic period were given in Table (9).

**Table 9.** General Attitudes of Students Towards E-Learning According to the Situation of Finding Distance Education Useful During The Epidemic Period.

	No	Group	n	$\bar{X}$	Ss.	p	F	Sd.	Post-Hoc (LSD)
Ability to E-Learning	1	Yes	39	34,8	5,2	,000	4,447*	2	1>2*(p= ,000) 1>3*(p= ,000)
	2	No	27	22,9	2,8				
	3	No comment	34	25,5	4,1				
Avoiding E-Learning	1	Yes	39	23,8	3,1	,000	4,635*	2	2>1*(p= ,000) 2>3*(p= ,000)
	2	No	27	33,6	5,2				
	3	No comment	34	26,1	4,3				

\* $p < 0.05$

According to Table 9; A significant difference was determined from the general attitudes towards e-learning, both from e-learning tendency and attitudes avoiding e-learning, according to the situation of the students participating in the study finding distance education useful during the epidemic period ( $p < 0.05$ ). In this difference determined; In the e-learning sub-dimension, students who find distance education useful during the epidemic period have higher values than students who do not find distance education useful during the epidemic and have no idea about the benefits of education applied during the epidemic period, and in the e-learning avoidance sub-dimension, distance education applied during the epidemic period is beneficial. The students who did not find it were found to have higher values than the students who found distance education useful during the epidemic period and the students who had no idea about the faults of the education applied during the epidemic period ( $p < 0.05$ ).

There was no significant difference between the attitudes of the Participating Students towards Distance Education Applied during the Epidemic Period and the variables of the class, the attendance status and the device that the courses were followed ( $p > 0.05$ ).

## DISCUSSIONS AND CONCLUSION

In this study, the attitudes of the Faculty of Sports Sciences students towards distance education during the COVID-19 period were examined according to the variables of gender, class, internet Access status, participation in classes, the device on which the courses are followed, the environment of attending classes and seeing distance education as beneficial. As a result of the research, it was observed that there were significant differences in the attitudes of the students of the Faculty of Sport Sciences towards distance education variables according to the variables of gender, regular internet access, participation environment, being disturbed while listening to courses and finding distance education useful. In the study, it was observed that a substantial part of the students found distance education applied during the epidemic period beneficial.

These results can be interpreted as that students find distance education useful in terms of not disrupting education and experiencing any victimization during the epidemic period. Also, the limited number of studies on the attitudes of university students towards distance education during the COVID-19 period makes it difficult to evaluate these research results.

In the study, it was observed that students' attitudes towards distance education differ significantly in favor of female students according to gender. The conclusion of the present study may be interpreted as the fact that female students see education and school as an opportunity to prove themselves and their desire to be successful plays an active role in their high attitude towards distance education. Eğrican (2011) stated in studies on female students that women are more docile than men, they are more determined to be successful than men, that female students see being successful in education as a prerequisite for self-fulfillment, and this situation motivates them. Even if COVID-19 changes the way of education, it can be said that female students have a high attitude towards distance education in order not to disrupt their education and to maintain or increase the level of success. Also, the fact that females are more prone to docile, their internalization of school rules and their high motivation to learn online may be effective in the emergence of this result. Some studies have shown that female students have better online communication and have higher motivation to take online courses than male students. It was also observed that female students performed better in online courses and exams, continued their courses without interruption, and were more successful in organizing their own programs. It was also observed that female students were more consistent in achieving their goals and had higher self-confidence (McSporrán & Young 2001; Yoo & Huang, 2013). Similarly, female students' self-esteem perceptions and academic commitment towards to online courses it were found to be higher than male students (Price, 2006). Accordingly, it can be said that the results obtained in favor of women in previous studies are consistent with the results of this study and confirm the results obtained from the study.

In the study, it was observed that students' attitudes towards distance education differ significantly according to their internet Access status. Research findings show that students who have regular internet Access benefit better from distance education. Similarly, Kirali and Cinar (2016) stated that students with internet Access have more positive attitudes towards distance education than students without internet access. On the other hand, in the study conducted by Ozyurek et al., (2015) it was seen that 28.73% of the students could not Access the courses properly due to the internet connection problem. Sercemeli and Kurnaz (2020) stated that students cannot access distance education courses due to their lack of sufficient internet quota. Anvar and Adnan (2020), Dutta and Smita (2020) also stated that technical and financial problems related to distance education applied during the epidemic period negatively affected the internet access status of students. These results show that one of the most common problems in distance education is regular internet access. Also, problems with internet access in distance education may cause inequality in active learning. The results of the research also reveal that in distance education, the use of online learning, videos, pictures and various files, the applicability of this education method and regular internet access is important.

In the study, it was observed that students who regularly attend courses have higher attitudes towards distance education than students who do not attend regularly. Therefore, it can be said that regular attendance in courses in distance education is effective in the high attitudes of students. These results also show that students understand that under any circumstances, attending classes regularly contributes to continuing education without interruption and to academic success. Mishra et al., (2020) Although there were some problems at the beginning of the participation in online courses during the COVID-19 period, it was observed that students' interest in online courses gradually increased and they did not have problems with regular participation in the course. Similarly, Ayvaci and Bebek (2016) stated that students are more eager to take courses given by distance education and this reflects positively on students' regular participation in classes. On the other hand, Tunga and Inceoğlu (2016) stated that the regular participation levels of students in distance education are lower than formal education. Ozgol et al., (2017) stated that the fact that students do not have to attend classes in distance education negatively affects participation, as there is no instructor to interact with in distance education as in face-to-face education. In the same study, they stated that the courses accumulate because they do not follow the courses regularly in distance education and this leaves students in a difficult situation. In the study conducted by Balikcioğlu et al., (2019), it was observed that 53.7% of the students did not regularly attend distance education courses. Courses can be listened

to again in distance education, lack of sufficient control mechanism to ensure regular participation as in formal education, etc. In addition, problems such as internet connection problems, insufficient technical infrastructure, the inexperience of students in using the distance education system can be shown among the factors that prevent students from regularly attending classes. Mishra et al., (2020) stated that the technical problems experienced in the internet connection negatively affected the participation in online courses in distance education applied during the COVID-19 period. It can be said that the elimination of such problems may positively affect students' regular participation in online classes.

In the study, it was observed that students who were not disturbed while attending distance education courses had higher values in the sub-dimension of e-learning disposition than students who were disturbed. However, in the e-learning avoidance sub-dimension, it was observed that students who were disturbed while attending distance education courses had higher values than students who were not disturbed while attending distance education courses. It has been observed that there are old and new studies similar to the results of this study in the literature. For example, in the study conducted by Kay et al., (2020), it was observed that online courses provide students with a more comfortable study area and students focus better on the courses. In the study conducted by Ozyurek et al., (2015), it was observed that 18.27% of the students had problems arising from the family environment while listening to the courses. Sindiani et al., (2020) stated that students' academic success declined because they could not listen to courses in a calm environment during online courses. According to these results, the fact that most of the members are at home due to the social isolation applied during the epidemic may have made it difficult for students to follow the courses without being disturbed in the home environment. Therefore, it can be said that the appropriate environment for listening to distance education courses is important in terms of motivating students and understanding the courses better.

In the sub-dimension of e-learning tendency of the students participating in the study, it was observed that the students who found distance education applied during the epidemic beneficial had higher values than the students in the other group. These results show that students adapt to distance education applied in case of sudden situations. Atay (2020) states that in the study examining the attitudes of students towards distance education applied in the COVID-19 period, students are satisfied with the distance education applied during the COVID-19 period, and that they find distance education useful in cases where face-to-face education cannot be done for various reasons and in terms of supporting in-class education. Sindiani et al. (2020) stated that students find distance education useful because online courses applied in the COVID-19 period help maintain social distance and reduce school expenses. Previous studies also confirm these research findings. For example, Gregory and Lodge (2015) observed that students found distance education useful due to the opportunities it provides in listening to the distance education courses from the recording and accessing various courses and materials. On the other hand, in the e-learning avoidance sub-dimension, it was observed that students who did not find distance education applied during the epidemic period beneficial had higher values than the students in the other group. These results show that students who are used to formal education have difficulties in adapting to distance education. In a study by Ozgol et al., (2017) in which students evaluated distance and formal education, they stated that students who came to the university with the expectation of receiving face-to-face education did not care about distance education as much as formal education, found distance education boring, and did not get enough efficiency from some courses given by distance education. In the same study, they stated that students felt lonely because of distance education and this reduced their desire to participate in the lesson. A similar opinion is also stated in Ayvaci and Bebek's (2016) research. Also, they stated that students made correspondence and exchanges that are not related to the lesson in online courses and that this harmed the seriousness of the lesson. Bayram et al., (2019) stated that physical education and sports college students' attitudes towards the advantages of distance education lessons were low. In the studies of Kurtuncu and Kurt (2020), it was stated that students thought that sufficient efficiency could not be obtained from both the theoretical and applied courses in distance education applied due to COVID-19. Khalil (2020) stated that students are not satisfied with the distance education carried out during the COVID-19 period. Therefore, he stated that students do not find distance education courses as beneficial as the courses in the regular classroom environment. Nenko et al., (2020) stated that the distance education carried out during the COVID-19 period could not meet the needs of the modern information society in its current state. In Sercemeli and Kurnaz (2020),

noting that teaching courses with distance education during the COVID-19 period is not as beneficial as the courses taught in formal education, students do not feel well psychologically in this period, so homework, exams, etc. They stated that they could not focus. These results can be interpreted as that students do not see distance education as an adequate and useful education method due to various problems experienced in the distance education system. Also, the fact that the current research was conducted during the COVID-19 epidemic period and the psychological and social consequences caused by the epidemic may have affected the way students evaluate distance education. Because the students participating in the research came to the university by preferring formal education and focusing on this form of education. Telli Yamatomo (2006) stated that the campus experience is one of the most important factors in students' university life, and the location of the campuses and the various facilities in the mare a center of attraction for students. Switching to distance education quickly due to the epidemic may cause students to have difficulty in adapting to this transition and not to get enough efficiency from this education.

As a result, the COVID-19 epidemic, which deeply affected the education and training system in many countries, caused students to be unprepared for this sudden situation they had not seen before. It is observed that while the courses taught with the formal education method under normal conditions are tried to be continued with distance education, the process remains uncertain in the teaching of applied courses. As a result of the research, it was seen that the state of internet access, the technical infrastructure used, the online listening environment and regular attendance to the lessons affected the adaptation and motivation of the students to the distance education system. Therefore, while some students adapte asily to the distance education process, it is seen that some students have adaptation problems and do not get enough efficiency from distance education.

Distance education applied in this period is not a choice, but a necessity caused by the epidemic. For this reason, universities should be prepared for possible future crises and epidemics and have a crisis management plan that they can implement in such compulsory situations. It is thought that in the face of sudden developments such as the COVID-19 epidemic, it is necessary to make sudden situation planning for the use of distance education, to alleviate the anxiety of students in this period, to eliminate the lack of concentration and to raise more awareness of students about distance education. It will also be useful for educators to design learning programs that will alleviate student anxiety and ensure the online participation of students during this period. Also, accelerated remedial lessons can be implemented after the epidemic for practical lessons that students cannot see. The sample group of the present study is not large enough to detect small correlations. This situation may limit the generalizability of the results revealed in the research findings and the strength of the claims about the research results. For this reason, the use of methods that will enable more in-depth analysis on the subject in future studies will contribute to obtaining stronger and more useful results.

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