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## Social Phobia Prevalence among Academicians in Cumhuriyet University

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Reaseach Article	ABSTRACT
	Introduction and Aim: Social phobia; It is a public health problem that can lead to failure in working life, major
History	depression and even suicide. The aim of this study was to investigate the prevalence of social phobia and related
	factors in academicians from Cumhuriyet University.
Received: 07/09/2022	Materials and Methods: This cross-sectional study was performed in 2017. The universe of the study consists of
Accepted: 26/03/2023	1605 academicians working in the health, science and social science fields of Cumhuriyet University. The sample
	size was determined as 216. A two-part questionnaire was applied to the participants. The first part consists of
	questions that investigating the sociodemographic characteristics and the variables that we think are related to
	social phobia. The second part consists of Liebowitz Social Anxiety Scale (LSAS).
	Results: The frequency of social phobia was found to be 9.0%. While the prevalence of mild and significant social
	phobia was 3.6%, the prevalence of social phobia was 1.8%. More than half of the academicians show avoidance
	behavior in situations requiring performance. Conclusion: As a result, it has been found that social phobia has a
	significant frequency of 9.0%. This situation, which may adversely affect the professional performance and
	mental health of academicians, is important for public health.
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	which may adversely affect the professional performance and mental health of academicians, is important for
	public health.

Keywords: Social Phobia, Academician, Cumhuriyet University

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Geliş: 07/09/2022	Cumhuriyet Üniversitesi'nde görevli akademisyenlerde sosyal fobi sıklığı ve ilişkili faktörlerin araştırılmasıdır.				
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	Üniversitesi merkez kampüsünde çalışan sağlık, fen ve sosyal bilim alanlarında görev yapan 1605 öğretim elemanı				
	oluşturmaktadır. Örnek büyüklüğünün sayısı 216 olarak belirlenmiştir. Katılımcılara iki bölümden oluşan bir anket				
	uygulanmıştır. Birinci bölüm sosyodemografik özellikleri ve sosyal fobi ile ilişkili olduğunu düşündüğümüz				
	değişkenleri sorgulayan sorulardan oluşmaktadır. İkinci bölüm Liebowitz Sosyal Anksiyete Ölçeğinden (LSAÖ)				
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#### Introduction

In 1621, Robert Burton described the symptoms of anxiety attacks in socially anxious people in his book "The Anatomy of Melancholy"<sup>1</sup>. Anxiety disorders are the most prevalent psychiatric disorders. According to epidemiological surveys, one third of the population is affected by an anxiety disorder during their lifetime. There are several types of anxiety disorders, including generalized anxiety disorder, panic disorder, specific phobias, agoraphobia, social anxiety disorder and separation anxiety disorder<sup>2</sup>.

Social anxiety disorder (SAD), also known as social phobia is classified in the Diagnostic and Statistical Manual of Mental Disorders (DSM-5). Diagnostic criteria for social anxiety disorder according to DSM-5 are as follows.

a. Persistent fear of one or more social or performance situations in which the person is exposed to unfamiliar people or to possible scrutiny by others. The individual fears that he or she will act in a way (or show anxiety symptoms) that will be embarrassing and humiliating.

b. Exposure to the feared situation almost invariably provokes anxiety, which may take the form of a situationally bound or situationally predisposed Panic Attack.

c. The person recognizes that this fear is unreasonable or excessive.

d. The feared situations are avoided or else are endured with intense anxiety and distress.

e. The avoidance, anxious anticipation, or distress in the feared social or performance situation(s) interferes significantly with the person's normal routine, occupational (academic) functioning, or social activities or relationships, or there is marked distress about having the phobia.

f. The fear or avoidance is not due to direct physiological effects of a substance (e.g., drugs, medications) or a general medical condition not better accounted for by another mental disorder<sup>3</sup>. SAD; is a disease that affects one's quality of life negatively. It can cause failure in the working life, major depression and even suicide. For these reasons SAD is considered as public health problem. Preexisting SAD increases the risk for "early-onset" depression<sup>4-6</sup>. Stein et al. reported that SAD in the adolescent period is a strong risk factor for depressive illness in young adulthood. Depression and SAD combination in the adolescent period evidently increases the risk for subsequent depressive disorder<sup>7</sup>.

Decline in various indicators of the quality of life, severely impaired everyday functioning not only in social, but also in educational and occupational aspects can be seen. SAD is associated with higher risks of suicide and of developing other psychopathology<sup>8</sup>.

The aim of this study is to investigate the frequency of SAD and related factors in academicians at Cumhuriyet University.

#### **Material and Methods**

This cross-sectional study was conducted in 2017. The population of the study consists of 1605 academic staff working on the central campus of Cumhuriyet University. Number of the sample size was determined to be 216 ( $\alpha$ =0,05, d=±0,035, p=0,10, q=0,90 t=1,96).

The academic staff included in the study were selected with stratified random sampling method. The number of academicians working in health sciences, natural sciences and social sciences were determined at Cumhuriyet University. Each field of science was stratified according to academic level. Academics were informed about the research. Questionnaire forms were given in closed envelopes.

The questionnaire consists of two parts. The first part contains of questions about sociodemographic characteristics and the variables we think are related to SAD. The second part consists of Liebowitz Social Anxiety Scale (LSAS)<sup>9</sup>.

LSAS was developed by Liebowitz in order to evaluate the severity of anxiety and avoidance in social environments and situations requiring performance. The validity and reliability study of LSAS in our country was performed by Dilbaz and Güz and the internal consistency (Cronbach alpha) was found to be 0.96<sup>10</sup>. The scale is composed of 24 items divided into 2 subscales, 13 of them concerning performance anxiety, and 11 of them pertaining to social situations. The 24 items are rated on a Likert Scale from 1 to 4 first on anxiety felt during the situations, and then regarding the avoidance of the situations. The total score could be calculated by collecting the points obtained by the academicians from each section. 55-65 moderate SAD, 66-80 significant SAD, 81-95 severe SAD, ≥96 has been evaluated as very severe SAD. Since each question was 4 points in Turkish version, the total score was adapted according to the original version. SPSS (ver 23) program was used for statistical evaluation of the data. The data obtained were expressed with descriptive statistical criteria such as arithmetic mean, standard deviation, and percentage, and the Chi-square test was used for comparisons. The statistical significance level in the analyzes was accepted as p<0.05.

#### **Ethical Aspect of Research**

Cumhuriyet University Non-Interventional Clinical Research Ethics Committee approval (Ethics Committee Decision No: 2017-03/11) was obtained to conduct the study. Verbal consent was obtained from the individuals participating in the study after the explanation about the research was given.

This work was supported by the Scientific Research Project Fund of Cumhuriyet University under the project number T-741; Cumhuriyet University, [T-741]; Sivas/Turkey. Of the participants, 69 were female (41.1%) and 99 were male (58.9%). The mean age was 42.9±11.1years. 44 (26.7%) of them were professors, 24 (14.6%) were associate professors, 48 (29.1%) were assistant professors, 6 (3.5%) were prelectors and 43 (26.1%) were employed as research assistants. 132 (78.6%) of the participants were married. Fifty-two of the participants (32.7%) were employed in medicine, 30 (18.9%) in engineering and 32 (20.1%) in faculty of science (Table 1).

The prevalence of SAD was found to be 8.7 percent in females and 9.1 percent in males. The frequency of phobia was found to be 18.6 and most frequently under the age of 30 years (Table 1).

#### Results

Table 1. Social phobia prevalence in academicians according to some socio-demographic characteristics.

	•		-	- 0 - 1
	Normal		Social phobia	
	N	%	n	%
<b>Gender</b> ; X <sup>2</sup> =0.01, p		/0		/0
<b>Genuel</b> , $\lambda = 0.01$ , $p$	-0.05			
Female	63	91.3	6	8.7
Male	90	90.9	9	9.1
Age groups; X <sup>2</sup> =6.1	6 p>0.05			
<20	26	01 0	C	19.6
<30	26	81.3	6	18.6
30-39	34	89.5	4	10.5
40-49	36	97.3	1	2.7
50-59	46	93.9	3	6.1
60>	11	91.7	1	8.3
Mean Age (X±SD)		42.9±11.1		
Marital status X <sup>2</sup> =0	).40, p>0.05			
Married	120	90.9	12	9.1
Bachelor	29	90.6	3	9.4
Divorced	4	100.0	-	-
<b>Faculty</b> X <sup>2</sup> =16.80, p	>0.05			
Medicine	44	84.6	8	15.4
Science	30	93.7	2	6.3
Engineering	29	96.7	1	3.3
Theology	16	94.1	1	5.9
Health Science	14	100.0	0	0.0
Literature	10	90.9	1	9.1
Dentistry	2	100.0	0	0.0
Junior Technical	0	0.0	1	100.0
College				
Academic Degree,	X <sup>2</sup> =11.08, p>0.05			
Professor	43	97.7	1	2.3
Associate	23	95.8	1	4.2
Professor	25	55.0	1	7.2
Assistant	45	93.8	3	6.3
Professor	<del>-</del> -5	55.0	5	0.5
Prelector	5	83.3	1	16.7
Research	35	81.4	8	18.6
Assistant	55	01.4	0	10.0
ASSISTALL				

While the frequency of SAD was the most common among the academicians belonging to the Faculty of Medicine, there was no person with SAD in the Faculty of Health Sciences. While the frequency of SAD was the most common research assistant, the lowest frequency was found in the professors and associate professors. Considering the place where they lived longest until 18 years of age, the frequency of SAD has been found to be 17.9% for the academicians who lived in the town and 6% for those who lived in the city center (Table 2). The frequency of phobia has been found to be 13.5% in the academicians diagnosed with chronic disease and 7.6% in those without the disease (Table 3). SAD was not detected in those who described their socioeconomic status as low in childhood (Table 2).

Table 2. Social phobia prevalence in academicians according to some familial and environmental characteristics.

	N	ormal	Social	phobia
		Unnar	Social	pilobia
	N	%	Ν	%
Living place until the age	e of 18, X <sup>2</sup> =4.	57, p>0.05		
Provincial center	110	94.0	7	6.0
District	23	82.1	5	17.9
Village	19	86.4	3	13.6
How many siblings you a	и <b>ге,</b> Х²=1.99, р	>0.05		
1	3	100.0	0	0
2	37	86.0	6	14.0
3+	113	92.6	9	7.4
What is your birth order	<b>?,</b> X <sup>2</sup> =1.473, p	>0.05		
1	54	88.5	7	11.5
2	54 44	88.5 91.7		-
-		• =	4	8.3
3+	54	94.7	3	5.3
<i>How do you evaluate you X</i> <sup>2</sup> =2.97, <i>p</i> >0.05	ur socioecono	mic status in your ci	niianooa?	
Good	41	93.2	3	6.8
Moderate	93	88.6	12	11.4
Poor	18	100.0	0	0.0
How do you describe the	family enviro	onment in which you	ı grew up?	
X <sup>2</sup> =3.11, p>0.05				
Democratic / tolerant	89	92.7	7	7.3
Authoritative	49	92.5	4	7.5
Over protective	13	86.7	2	13.3
Indifferent parent	2	66.7	-	33.3
Have you ever been bea	ten hv vour n	••••	nood?	00.0
X <sup>2</sup> =0.182, p>0.05	···· », , ···· p			
Yes	70	92.1	6	7.9
No	83	90.2	9	9.8
How often have you bee	n beaten by y	our parents? X <sup>2</sup> =0.6	89, p>0.05	
Rarely	65	92.9	5	7.1
Often	5	83.3	1	16.7
Have you ever been beat	ten by your te	acher in elementary	<b>school?</b> x2=0.621,	p>0.05
Yes	61	92.4	5	7.6

No	92	90.2	10	9.8
How often have you b	een beaten by yo	our teacher? $\lambda^2 = 0.2$	62, p>0.05	
Rarely	57	91.9	5	8.1
Often	2	100.0	0	0.0
Continuously	1	100.0	0	0.0
How many close frien	ds did you have ii	n childhood? X <sup>2</sup> =14.	.78, p<0.05	
None	5	55.6	4	44.4
1	16	94.1	1	5.9
2 and more	132	93.0	10	7.0

### Table 3. Social phobia prevalence in academicians according to lifestyle characteristics.

	No	rmal	Social	phobia
	N	%	N	%
Do you smoke cigaret	tes ? X <sup>2</sup> =0.128,	<i>p&gt;0.05</i>		
Smoker	35	89.7	4	10.3
Non smoker	98	91.6	9	8.4
Quitter	19	90.5	2	9.5
The amount of cigare	ttes smoked? (p	ocket/year) X <sup>2</sup> =0.613	3, p>0.05 <b>Do you sr</b>	noke?
Less than 20	27	90.0	3	10.0
20-39	3	100.0	0	0.0
40+	5	83.3	1	16.7
Do you consume alco	hol ? X <sup>2</sup> =0.821,	p>0.05		
Yes	49	90.7	5	9.3
No	100	91.7	9	8.3
How often do you cor	nsume alcohol?	X <sup>2</sup> =3.93, p>0.05	-	
		<i>,</i> ,		
Rarely	24	96.0	1	4.0
Often	20	90.9	2	9.1
Continuously	5	71.4	2	28.6
Do you participate in	social activities	with your family? X <sup>2</sup>	=0.439, p>0.05	
N	422	04 7	12	0.2
Yes	132	91.7	12	8.3
No Do una continizato in	21	87.5	3	12.5
Do you participate in	social activities	with your friends? X	=0.277, p>0.05	
Yes	139	91.4	13	8.6
No	14	87.5	2	12.5
How many close frien	ds do you currei	<b>ntly have?</b> X <sup>2</sup> =5.50, p	>0.05	
None	8	72.7	3	27.3
1	5	83.3	1	16.7
2 and more	140	92.7	11	7.3
Do you exercise regul	arly? X <sup>2</sup> =0.00, µ	o>0.05		
Yes	40	90.9	4	9.1
No	113	91.1	11	8.9
Do you play musical i	nstrument? X <sup>2</sup> =(	0.00. p>0.05		
Yes	31	91.2	3	8.8
No	120.	9.9	12	9.1
What is the TV progra				
Competition	4	50.0	4	50.0

program				
Marriage	0	0.0	1	100.0
Program				
Film	19	82.6	4	17.4
Series movie	24	100.0	0	0.0
Documentary	30	100.0	0	0.0
News	55	91.7	5	8.3
Sports	10	100.0	14	9.0
Do you have any ch	ronic diseases ? X <sup>2</sup>	=1.227, p>0.05		
Yes	32	86.5	5	13.5
No	121	92.4	10	7.6
Do you have any dia	agnosed mental ill	ness? X <sup>2</sup> =0.582, p>0.0	)5	
Yes	3	100.0	0	0.0
No	148	90.8	15	9.2
Do you have any me	ental illness in you	r family? X <sup>2</sup> =0.582, p	>0.05	
Yes	9	90.0	1	10.0
No	144	91.1	14	8.9

According to LSAS scoring the means of anxiety, avoidance and the total scores were detected as  $38.64\pm10.82$ ,  $35.41\pm$  9.01 and  $74.18\pm$  18.49 respectively.

When the LSAS scores were evaluated according to related factors the mean of anxiety was higher in women  $(39.1\pm11.2)$  while the mean of avoidance  $(35.8\pm9.3)$  was higher in men.

The mean anxiety score in the 30-year-old group was 40.7 $\pm$ 12.5. The mean anxiety score was decreasing with increasing age. The mean score of avoidance under 30 years and over 60 years of age was higher than other groups. The mean score of anxiety (39.1 $\pm$ 10.9) and avoidance score (35.5 $\pm$ 8.8) were higher in married academicians. The lowest avoidance (35.3 $\pm$ 12.2) and anxiety score averages (32.0 $\pm$ 4.7) were detected in divorced academicians. When the mean score was compared according to faculties, there was higher anxiety and avoidance scores in the Faculty of Medicine. The Faculty of Health Sciences had the lowest mean score of anxiety (35.3 $\pm$ 5.3) and avoidance (31.1 $\pm$ 6.4).

The anxiety  $(36.1\pm7.9)$  and avoidance  $(34.0\pm6.90)$  scores of the professors were lower than the other academic staff. In Research assistants the anxiety and avoidance scores were detected as  $40.3\pm12.1$  and  $38.1\pm12.3$  respectively.

The anxiety and avoidance scores of the patients living alone at home were determined as 36.7±10.1 and 34.7±6.5 respectively. Those who lived in the subprovince until the age of 18 had higher anxiety scores than those living in the city. The anxiety score was 42.7±12.8 in patients with chronic disease and 37.5±10.0 in patients without chronic disease. The anxiety and avoidance scores were 31.3±4.9 and 31.0±4.6 in patients with a diagnosed mental illness. However, there was no statistically significant difference. Those who rated their socioeconomic status as good in their childhood had lower anxiety and avoidance scores. The mean score of anxiety and avoidance for those who considered their parents uninterested in their childhood was found to be 47.0±10.68 and 39.3±5.7 respectively. The mean score of anxiety and avoidance for those who considered their parents as overprotective during their childhood was 42.8±8.3 and 38.1±9.0 respectively. The mean anxiety and avoidance scores in academicians who were frequently beaten by their parents during childhood were found as 44.7±11.8 and 42.2±14.1 respectively. Those means were 37.7±10.1 and 34.4±8.5 in academicians who did not get beaten by their parents in childhood, respectively. The means of anxiety and avoidance score in the academicians who were beaten by their teachers in primary school were 38.1±9.7 and 35.0±8.9 while those means in academicians who were not beaten were detected as 39.0±11.5 and 35.5±9.2 respectively.

In smokers the anxiety and avoidance scores were found as 39.2±10.4 and 36.1±9.1, while for nonsmokers 37.2±10.6 and 34.6±9.2 respectively.

Anxiety and avoidance score were found as  $36.5\pm8.1$  and  $33.8\pm6.5$  for those who consume low amounts of alcohol, and  $45.0\pm24.7$  and  $33.9\pm11.1$  for those who consumed excessive amounts.

Anxiety and avoidance scores were 38.4±10.6 and 35.1±8.9 for academicians participated in social activities with their families, and 40.2±12.5 and 37.4±9.7 respectively for those did not.

It was seen that anxiety and avoidance scores were lower in who had more than two close friends in childhood. The anxiety scores were higher in the academicians who interested in sports  $(40.7\pm12.0)$ and played musical instruments  $(40.0\pm13.1)$ . The lowest anxiety  $(32.8\pm6.8)$  and avoidance  $(31.7\pm5.8)$  scores were observed in the followers of the documentary TV channels.

Two point five percent of the academicians stated that they had severe anxiety in case of getting up and talking in a meeting without being ready. Trying to meet someone to establish a romantic or sexual relationship has caused severe anxiety in 10.7% of academicians. Movement, demonstration or speech in front of the audience causes anxiety in 7.7% of academicians.

When the anxiety subscale is evaluated, ability skill or knowledge testing leads to severe anxiety in 4.2% and avoidance behavior in 2.4% of academicians. Looking directly into the eyes of strangers resulted in moderate anxiety in 8.9% of academicians, while caused avoidance behavior for %6.5 of academicians. Speaking with strangers resulted in moderate anxiety in 5.4% of academicians, while 6% of academicians mostly avoided this situation.

According to LSAS 23.2% of academicians showed avoidance behavior when trying to meet someone in order to have a romantic or sexual relationship. 6.5% of the academicians stated that they always showed avoidance behavior in this case. When they had to get up and talk in a meeting without pre-preparation, 24.4% of the academicians stated that they often show avoidance behavior, while 6.0% stated that they always show avoidance behavior. The frequency of phobia in academicians is given in Table 4.

# Table 4. The frequency of social phobia inacademicians

	Ν	%
Normal	153	91.0
Moderate social phobia	6	3.6
Marked social phobia	6	3.6
Severe social phobia	3	1.8
SAD Total	15	9.0

The prevalence of SAD was found to be 9.0%. The prevalence of moderate and marked SAD was 3.6% and the frequency of severe SAD was 1.8% (Table 4). No significant relationship has been found between smoking and alcohol use and SAD frequency. Social phobia was more common in academics who did not have close friends in childhood (44.4%) (p<0,05) (Table 2). While the frequency of social phobia was detected as 7.3% in academicians who have two or

more close friends this frequency was 27.3% in who have no close friends. No significant relationship has been found between regular sporting, musical instrument playing and the frequency of SAD. When the most watched television program was analyzed, it was seen that there were no social phobic academicians among those who watch documentary and TV series. The frequency of SAD was higher in academicians who were watching competition program and movies (p<0,05) (Table 3). No significant relationship was found between SAD and gender, age groups, marital status, faculty, academic degree, place of living until the age of 18, the number of siblings, the number of children of the family, presence of chronic illness, presence of mental illness, presence of mental illness in the family, socioeconomic status in childhood, exposure to family and teacher violence in childhood, parents' tendency to violence against themselves while growing up. SAD was found to be significantly lower in those who had a close friend as a child (p<0,05) (Table 2).

#### 4.DISCUSSION

SAD is a relatively common disorder that affects 7% to 3% of individuals in developed countries throughout their lives<sup>11</sup>. There is no evidence that prevalence rates have changed in recent years. Differences in prevalence rates in different countries and cultures may result from differences in methodology rather than culture-specific factors. Epidemiologic studies may help in planning treatment and prevention programs, and they may also help us to better understand the etiology of these disorders<sup>12</sup>. Researches conducted in Turkey in 1996, according to the profile of Mental Health Research, the prevalence of SAD in the last 12 months, adults were found to be 1.8%<sup>13</sup>. The frequency of SAD was determined as 9.8% in a study conducted in Cumhuriyet University<sup>14</sup>. In a study conducted by Gültekin et al. on 700 students; the prevalence of SAD in the last 12 months and lifetime was 20.9% and 21.7%, respectively<sup>15</sup>. In Kessler's study, prevalence estimates of 12-month-old and lifelong social anxiety disorder (DSM-IV) were reported to be 7.1% and 12.1%, respectively, with higher prevalence rates in women<sup>16</sup>,. In a study conducted by Stein et al reported that, the estimated lifetime, 12-month, and 30-day SAD prevalence is highest in high income countries (5.5%, 3.1%, 1.7%), intermediate in upper-middle income countries (2.9%, 2.1%, 1.3%), and lowest in low/lower-middle income countries (1.6%, 1.0%, 0.5%)<sup>17</sup>. In our study, we determined the frequency of SAD as 9.0%. We could not find any study investigating the frequency of SAD in academicians.

This frequency in academicians is consistent with other studies.

SAD is frequently seen in academics who are working as Research Assistants. Being in the lowest level of the academic hierarchy may have been a cause of this phenomenon.

In our study, SAD was most frequently seen in academicians working in the Faculty of Medicine. In addition to the hierarchical order within the faculty, this situation may also be caused by living in isolation from social life due to the nature of the profession.

Asher et al. argued that female gender was more disadvantageous for SAD<sup>18</sup>. Studies supporting the hypothesis of Asher et al. are predominant<sup>11,19-21</sup>. There are also studies that suggest that social phobia is more common in male gender. Cakin et al. Found a significant difference in SAD scores according to gender. Men had higher SAD total and subscale scores (excluding social avoidance and distress general subscale) than girls<sup>22</sup>. In our study, the mean score of anxiety in women was higher in males but the mean score of avoidance was higher in men. In terms of frequency of SAD, we could not find a significant difference between men and women. This result in our study may be caused by the high level of education and social status of the individuals participating in our study. This situation is similar to other studies in the literatüre<sup>23-27</sup>.

While the frequency of SAD was the most common among the academicians belonging to the Faculty of Medicine, there was no person with SAD in the Faculty of Health Sciences. The frequency of SAD was determined to be least in professors and associate professors. As academic career increases, the frequency of phobia decreases. We think that this may be due to the decrease in the frequency of SAD with age and the decrease in the concern about the professional career.

Izgic et al. reported that the family of young adults with SAD had a higher family history of psychiatric disorder<sup>14</sup>. In our study, we could not detect any differences in the family history of mental illness among those with and without SAD. When the child rearing styles of parents with social phobic children were examined, it was seen that these parents were overprotective or uninvolved against their children<sup>28</sup>. In our study, we found that the prevalence of phobia was higher in the academicians who considered their family as overprotective and uninvolved. Studies on individuals and their families with social anxiety suggest that the behavioral patterns learned from the family could play an important role in the transfer of SAD<sup>29</sup>.

In many studies has been reported a significant increase of alcohol use in the presence of

SAD<sup>19,21,30,31</sup>. Although the frequency of phobia was higher in academicians who consumed alcohol frequently no significant relationship was found between smoking and SAD in our study. In a study conducted by Villorosa et al, it was stated that the presence of SAD did not increase alcohol use and would only increase the outcomes of alcohol use<sup>32</sup>. Wells stated that individuals with SAD were married at a lower rate than the general population in 1994<sup>33</sup>. Wittchen defined not being married as a risk factor for SAD (34). In our study, no significant relationship was found between marital status and SAD. This result is consistent with another study conducted in a similar time period<sup>35</sup>.

In a study conducted by Gültekin et al showed a significant relationship between birth order and SAD<sup>21</sup>. However, no significant relationship has been found between SAD and birth order in our study. The difference between the two studies may have been caused by the mean age and current social position of the research population.

In our study, no significant relationship has been found between the presence of chronic disease and SAD. In a study conducted by Adams et al in 2016, it was concluded that there was a relationship between the presence of chronic disease and SAD<sup>36</sup>. The difference between the two studies may have been caused by differences in used methods.

In the study, no significant relationship was found between SAD and settlement (village or city) in childhood. This study is consistent with other studies in the literature<sup>35</sup>. A study conducted by Gültekin et al on university students found a significant relationship between city-district-village settlement and SAD<sup>21</sup>. This difference may be caused by the age group of the study population.

There are many studies in the literature regarding the presence of relationship between mental illness and SAD<sup>19,37,38</sup>. In our study, no significant relationship was found between the presence of mental illness and SAD.

It was found that the group with SAD reported more negative life events related to their childhood. Childhood experiences such as exposure to peer bullying, degrading experiences in the school, abuse, etc. are higher in the group with SAD<sup>39</sup>. In our study, we did not find any statistical difference regarding this issue.

Many studies emphasize the relationship between the socio-economic status of the family and the frequency of SAD in childhood. Karlsen et al found a strong relationship between social anxiety and mental health problems in the group of parents representing the low socioeconomic status<sup>40</sup>. In our study, we could not find any relationship between socioeconomic status and SAD. In the literature, there is a significant increase in nicotine use in the presence of SAD<sup>21,30,41,42</sup>. Potential causal links between social anxiety symptoms and nicotine dependence in adolescence should be investigated<sup>43</sup>. Social anxiety was found to be significantly associated with nicotine dependence in both cross-sectional retrospective and prospective-longitudinal analyses. It is suggested that social anxieties could lead to heavy tobacco use as smoking is a socially acceptable behaviour that relieves anxiety in social situations. Possible differential effects of social anxiety on the early stages of smoking behaviour compared to effects on nicotine dependence are discussed. These findings should stimulate a continued search into potentially causal links between social anxiety symptoms and the development of tobacco consumption and nicotine dependence in adolescence43.

In our study, it was concluded that having a close friend significantly reduced SAD. This is consistent with other studies in the literatüre<sup>19,44</sup>. In the light of these results, it can be said that the presence of close friends is an important factor for coping with SAD.

Regarding interventions for SAD, the extent of life intervention will be affected by a number of factors such as the severity of social anxiety and the individual's age, gender, life goals and culture<sup>45</sup>.

Another challenge lies in the improvement of access to the health care system both on the side of patients and on that of caregivers through optimizing, for example, the detection rates of SAD. As a first step, data on pathways of individuals with SAD to mental health services are urgently needed to provide starting points for effective structural interventions<sup>8</sup>.

In a study conducted by Eun reported that the low parental care and high maternal control were associated with a number of past-year mental disorders in adolescents. In the same study emphasized the complexity of the relationship between parenting style and mental health<sup>46</sup>.

#### Limitations of the Research

The present study was conducted among academicians in Cumhuriyet University, and the information obtained can not reflect the knowledge of other universities or the general population. It is recommended that researchs in this area be carried out with larger populations.

#### **5.Conclusion**

In our study, the frequency of SAD in academicians is quite high. Support should be given to academics

regarding this mental disorder, which has a negative impact on occupational success and leads to continuous anxiety and avoidance behavior. Starting from childhood, education should be planned to prevent social phobia. We think that participatory and active education models will prevent the development of social phobia at an early age. For this reason, education models that give students the opportunity to express themselves should be adopted. Training programs will be useful to increase SAD's awareness in the society.

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