

# Examination of Loneliness and Peer Relations of Physical Education Teacher Candidates

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## Abstract

The behavior of the physical education teacher in the classroom or in the gym also affects the students' achievement and personality development. It is important to examine different aspects of loneliness and peer relations, which are thought to be one of the indicators of the level of sociability, in the profession of physical education teacher. Therefore, this research was conducted to determine the loneliness and peer relations of physical education and sports teacher candidates. In the section of physical education and sport teachers 229 students were administered the UCLA Loneliness Scale and the Peer Relations Scale. According to the gender, while differences were found in peer relations, there was no difference in loneliness levels. There were differences in peer relations in terms of classes. It was found that the level of loneliness was different according to the number of close friends, the level of loneliness increased as the number of friends decreased, and the level of loneliness decreased as the peer relations increased. It was found that the highest level of loneliness was in students who spent 5-7 hours on social networks. As a result, it can be said that the inclusion of sportive game-like practices in school education is effective in strengthening friendship and reducing loneliness.

**Keywords:** loneliness, peer relations, physical education teacher

## 1. Introduction

Friendship is defined as an experience of voluntary and mutual relationship among individuals (Bukowski and Hoza, 1989). The individual can show healthy development due to his lifelong relationships with his family and friends (Atik Erkan et al., 2014). There are many contributions of peer groups in the individualization of the adolescent and as an independent individual in the society. Peer groups provide social support that reduces the impact of stressful events (Dornbush, 1989) and helps to acquire moral norms and values by providing adherence and sense of belonging, influencing adolescent self-esteem and self-esteem development, establishing interpersonal relationships with each other they also contribute to the development of skills (Henggeler, 1989). Since friends share many things in different areas of life (Berndt, 2002), such relationships tend to overcome the socio-emotional needs of the individual and feed them with intimacy, interest, and sharing (Furman and Buhrmester, 1985). It appears that the quality of friendship provides a number of psychological advantages for individuals, such as low levels of isolation and loneliness (Asher and Parker, 1993). Also, individuals with high-quality friendship relationships are often found to be more capable and compliant (Buhrmester, 1990; Updegraff and Obeidallah, 1999). Loneliness, which is considered a problem for the socialization of the individual, is described as an unwelcome and unpleasant experience accompanied by feelings of anxiety, anger, sadness, and feeling different from others (Jones, Freeman and Goswick, 1981, Russell, Peplau and Cutrona, 1980, Ditomasso and Spinner, 1997). According to Weiss (1973), loneliness is a complex and individualistic experience in general, and there are no definite and reliable statements about the manifestation of this subjective experience. According to him, loneliness can not be directly observed, but instead, the individual's loneliness can only be reached through subjective statements of the individual's own situation. Rogers (1994) suggests that the liberation of the individual from loneliness may be possible by changing the belief that the individual is not valuable and therefore not to be accepted by the people around him. Rogers also argues that an acceptable, non-judgmental, friendly environment in interaction groups can be an important way to eliminate loneliness. According to Krause-Parello (2008), loneliness can hinder the social development of the individual, and as a result it can have an effect on the physical and mental health of the individual. The physical, social and psychological characteristics of the physical education teacher are important for the education and orientation of the students (Tamer and Pular, 2001). The behavior and personality of the teacher also influences the classroom behavior and personality development of the students. The effect of teachers with different personality traits on students will also be different. Behaviors of the teacher in class, in the gymnasium or on the playing field besides the personality affect the achievements of the students in physical education (Tamer and Pular, 2001). Therefore, it is important to examine different aspects of loneliness and peer relations, which are thought to be one of the indicators of the sociability level of prospective teachers who will be future physical education teachers. For this reason, this research was conducted to determine the loneliness and peer relations of the physical education and sports teacher candidates. For this purpose, the following sub-problems have been searched.

- 1) Is there a difference in loneliness and peer relations according to gender of physical education and sports teacher candidates?
- 2) Is there a difference between loneliness and peer relations according to the classes of the physical education

and sports teacher candidates?

3) Are loneliness and peer relations changing according to the amount of closest friends of physical education and sports teacher candidates?

4) Are loneliness and peer relations changing according to the time spent in physical education and sports teacher candidates in social media?

5) Do peer relations of physical education and sport teacher candidates affect the levels of loneliness?

## **2. Method**

### *2.1. Participants*

The universe of the work is constituted by Kahramanmaraş Sutcu Imam University School of Physical Education and Sports, students of physical education and sports teacher department. The number of students studying in the department of physical education and sport teacher in the spring semester of 2015-2016 academic year is 240. A total of 229 students (115 female and 114 male) who were trained in physical education and sport teaching and who voluntarily agreed to participate in the study were accepted as the sample group.

### *2.2. Data Collection Tools*

The questionnaire used for data collection consists of three parts. In the first part, questions were asked to measure the information about the demographic characteristics of the students such as gender, age, income level, etc. The second part, the UCLA Loneliness Scale developed by Russell, Peplau and Cutrona (1980) was used to measure the level of loneliness. The Turkish validity and reliability study of this scale was done by Demir (1989). In each item of the scale, the participant is presented with a feeling or thought related to social relations, and the individual is asked to indicate how often they have experienced these situations. The internal consistency reliability factor of the Turkish form of the scale was found to be .85. In the third part, the Peer Relations Questionnaire (PAQ) was used. The ACS aims to assess the quality of relationships of children and adolescents with their best friends. This scale was developed by Bukowski et al. (1994). It was adapted to Turkish by Atik Erkan et al (2014). The internal consistency reliability coefficient for the entire scale was found to be .85. The questionnaires were applied to the students who accepted the study after receiving the necessary permissions for the research from the institute where the study was made. It took about 20 minutes to complete the questionnaires. The internal consistency reliability of the loneliness scale used in the present study was .69 and the internal consistency coefficient of the peer relationship scale was found to be .87.

### *2.3. Data Analysis*

The data obtained in the study were evaluated in the SPSS program and the frequency and percentage distributions of the data were determined. For normal distribution, skewness and kurtosis values were found between -1 and +1, and the distribution was accepted as normal. The independent-samples t-test was used to determine whether there was a difference between the two groups in terms of averages. One way anova was applied to determine whether the difference between the means of more than one group was significant. The tukey test was used to determine the source of the difference between the variables. Pearson correlation analysis was applied to determine the relationships between the variables. Significance level was taken as 0.05 and 0.01.

### 3. Findings

Table 1. Some demographic characteristics of physical education and sport teacher candidates

	<i>Variables</i>	N	%
<i>Gender</i>	Male	114	49.8
	Female	115	50.2
	Total	229	100
<i>Age</i>	Up to 19	30	13.1
	20-22	114	49.8
	22 and over	85	37.1
	Total	229	100
<i>Class</i>	1	38	16.6
	2	66	28.8
	3	68	29.7
	4	57	24.9
	Total	229	100
<i>Income status</i>	Low	55	24.0
	Middle	145	63.3
	High	29	12.7
	Total	229	100
<i>Are you satisfied with the city you are living in now?</i>	Yes	116	50.7
	Partially	85	37.1
	No	28	12.2
	Total	229	100
<i>How many closest friends do you have?</i>	0-1	34	14.8
	2 -4	81	35.4
	5-7	49	21.4
	8 and more	65	28.4
	Total	229	100
<i>The majority of your friends, from which Social</i>	School	175	76.4
	Out of school	54	23.6
	Total	229	100
<i>How much time do you spend daily on social networks?</i>	Up to 2 hours	90	39.3
	2 - 4 hours	86	37.6
	5 - 7 hours	28	12.2
	Over 8 hours	25	10.9
	Total	229	100

Table 1 contains information on the demographic characteristics of physical education and sport teacher candidates. According to this; 49.8% (n = 114) were male and 50.2% (n = 115) were female. (n = 68) were in the third grade, 28.8% (n = 66) and 24.9% (n = 57) were in the fourth grade and 16.6% (n = 38) Seen. Of the students, 63.3% (n = 145) had moderate income, and 35.4% (n = 81) of them had close friends between 2 and 4, 76.4% (n = 175) and 39.3% (n = 90) of the respondents reported that they spend up to 2 hours on social networks daily.

Table 2. Loneliness level and peer relations, independent samples t-test results by gender of physical education and sports teacher candidates.

	<i>Gender</i>	N	Mean	Sd.	t	p
Loneliness Level	Male	114	40.28	7.315	-.552	.581
	Female	115	40.83	7.621		
Peer Relations	Male	114	3.58	.599	2.587	.010*
	Female	115	3.79	.631		

\*(p<0.05).

In Table 2, there was a significant difference in peer relations in terms of gender (p<.05) and no difference in loneliness levels in physical education teacher candidates (p>.05).

Table 3. The results of one way anova test on loneliness level and peer relations according to the classes of the research group

	Class	N	Mean	SD	F	p	Tukey
Loneliness Level	1	38	39.57	6.85	.891	.446	-
	2	66	41.46	7.38			
	3	68	40.98	7.74			
	4	57	39.66	7.60			
Peer Relations	1	38	3.72	.62	3.134	.026*	4-3
	2	66	3.61	.56			
	3	68	3.57	.64			
	4	57	3.88	.62			

\*(p<0.05). 1-first class 2-second class 3-third grade 4- 4th grade

In Table 3, there were significant differences in peer relations between the 4th and 3rd year students in the physical education and sports teacher candidates (p<.05), but no significant difference was found in the loneliness levels (p>.05). According to this, it is seen that the highest peer relations are in the 4th grade.

Table 4. One way anova test results of loneliness level and peer relations according to the number of friends of the research group

	Number of friends	N	Mean	SD	F	p	Tukey
Loneliness Level	up to 1	34	45.35	7.42	6.724	.001*	1-2
	2-4	81	39.88	7.13			1-3
	5-7	49	40.81	7.21			1-4
	8-10	65	38.70	7.12			
Peer Relations	up to 1	34	3.42	.76	2.581	.049*	4-1
	2-4	81	3.73	.55			
	5-7	49	3.68	.54			
	8-10	65	3.76	.65			

\*(p<0.05). 1 - (up to 1) 2 - (2-4) 3- (5-7) 4- (more than 8)

In Table 4, there was a significant difference in peer relations between students with at least 1 close friends and students with more than 8 close friends (p<.05). In terms of loneliness levels, there was a significant difference between students with at least 1 close friends, 2 to 4, 5 to 7 and more than 8 friends (p<.05). Accordingly, the highest peer relations were those with more than 8 friends. It is also seen that the level of loneliness has increased due to the decrease in the number of friends.

Table 5. Independent samples t-test results, according to friend environment of the research group

	Majority of your friends, from which social environment?	N	Mean	Sd.	t	p
Loneliness Level	School	175	40.13	7.056	-1.582	.115
	Out of school	54	41.96	8.560		
Peer Relations	School	175	3.75	.585	2.963	.003*
	Out of school	54	3.47	.697		

\*(p<0.05)

In Table 5, there was a significant difference in peer relations according to which of the friends of the physical education and sports teacher candidates were turned around (p<.05). In terms of loneliness levels, no significant difference was found (p>.05). According to this, it is understood that the students whose close friends are from the school have higher friendship ties than those who have close friends from outside the school.

Table 6. One way anova test results, based on the time spent by physical education and sport teacher candidates on social networks

	Variables	N	Mean	SD	F	p	Tukey
Loneliness Level	(1) Up to 2 hours	90	40.90	7.76	3.586	.015*	3-2
	(2) 2 - 4 hours	86	38.76	6.93			
	(3) 5 - 7 hours	28	43.00	6.94			
	(4) Over 8 hours	25	42.80	7.53			
Peer Relations	(1) Up to 2 hours	90	3.69	.62	.021	.996	-
	(2) 2 - 4 hours	86	3.68	.59			
	(3) 5 - 7 hours	28	3.67	.69			
	(4) Over 8 hours	25	3.70	.65			

\*(p<0.05).1 - (up to 2) 2 - (between 2-4 hours) 3 - (between 5-7 hours) 4- (over 8 hours)

In Table 6, no significant difference was found in terms of peer relations when loneliness level and peer relations were compared according to the time spent in physical education and sports teacher candidates on social networks (p>.05). In terms of loneliness levels, there was a significant difference between those who spent

time in social networks between 2 and 4 hours and those who spent time in social networks between 5 and 7 hours ( $p < .05$ ). According to this, the highest level of loneliness seems to be spent in social networks between 5 and 7 hours.

Table 7. Peer relations, loneliness levels and number of close friends Pearson correlation analysis results.

	<i>Mean</i>	<i>SD</i>	(1)	(2)
Peer Relations (1)	3.68	.62	-	
Loneliness Level (2)	40.56	7.45	-.479**	-
Close friends (3)	3.63	1.04	.127	-.219**

\*\* Correlation is significant at 0.01 level. (two-way)

In Table 7, when the results of Pearson correlation analysis between peer relations, loneliness levels and number of close friends were evaluated, it was found that there was a moderate negative correlation between peer relations and loneliness level ( $r = -.479$ ,  $p < .01$ ). That is, as the peer relations increase, the level of loneliness is also decreasing. As the level of loneliness increases, the number of close friends decreases ( $r = -.219$ ;  $p < .01$ ).

#### 4. Discussion

In this study, it was tried to examine the loneliness and peer relations of the students of the physical education and sports teaching school, physical education and sports teaching department in terms of different variables. For this purpose, "UCLA Loneliness Scale" and "Peer Relationship Scale" were applied to a total of 229 students, 115 female and 114 male, who were educated in physical education teacher education. Findings obtained in the direction of the research were evaluated statistically and the results were interpreted and discussed respectively.

##### **Is there a difference in loneliness and peer relations according to gender of physical education and sports teacher candidates?**

In the present study, there were no significant differences in the levels of loneliness between male and female participants in terms of gender in physical education and sports teacher candidates (Table 2). Similarly, there was no significant difference in terms of sex change in the study conducted by Uzuner and Karagün (2014) in which loneliness levels of individuals engaged in recreational sports were examined. Again, in the meta-analysis study conducted by Pamuk et al. (2015) for the gender variable of loneliness, 38 effect sizes of 38 studies examining loneliness by sex in the YÖK thesis database were calculated. Significant differences were found in 14 of these 38 studies, but no significant difference was found in 24 of them. When these studies are evaluated together with the findings of the present study, it can be said that the feeling of loneliness lives at a similar level in both sexes.

There was a significant difference in peer relations in terms of gender in current study (Table 2). Similarly, Buhrmester (1996) reports that women have more intimate friendships than men. Again, Tozoglu et al. (2015) reported that women had higher average scores in terms of cooperation, protection, and closeness from friendship relations subscales, while they were low in conflict dimension. As you can see, the present study findings are similar to other study results. According to Mendelson and Aboud (1999), an individual is regarded as an important criterion for friendliness, friendliness that an individual feels for his friend. Therefore, it can be said that women have more intimate friendships in terms of gender in physical education and sports teacher candidates.

##### **Is there a difference between loneliness and peer relations according to the classes of the physical education and sports teacher candidates?**

There were no significant differences in the levels of loneliness according to classes in physical education and sport teacher candidates. However, it is reported that the highest level of loneliness in the study conducted by Buluş (1997) in university students is in the first grade. Yılmaz et al. (2008) also report that the level of loneliness of health college students is higher in the first year students than in the others, and falls to this level in the fourth class. Unlike other departments, student admission to physical education and sports college is conducted by special aptitude test. The majority of students participate in pre-college preparatory courses for special talents. The students meet each other on these courses. The fact that there is a significant difference in the levels of loneliness according to classes in physical education and sports teacher candidates can be attributed to this situation. The highest peer relations in terms of peer relations were found to be in the 4th grade (Table 3). Again, the majority of students chose school friends as close friends. These people had stronger friendships than those who selected their closest friends from outside the school (Table 5). This can be attributed to the fact that the curriculum of physical education and sport teaching includes the theoretical courses as well as practical sports education courses. It can be said that the friendship relations of the students during the time spent in the school have developed according to the intimate atmosphere in the practical lessons.

**Do the number of friends who are closest to physical education and sports teacher candidates affect loneliness and peer relations?** In terms of the number of closest friends in the physical education and sports teacher candidates, it is seen that the highest peer relations have more than 8 friends. As the number of friends

decreases, the level of loneliness also increases (Table 4). Similar to the present study, Demir (1990) reported that loneliness was associated with the number of close friends. Rab et al. (2008) reported that university students with more friends had less anxiety and depression. Geçtan (1993) states that one of the basic requirements of man is to trust people and to establish friendly

**Does the time spent on social networks affect their loneliness and peer relations?** According to the time spent in physical education and sports teacher candidates social networks, there is no significant difference in peer relations. However, according to the time spent on social networks, it is understood that there is a meaningful difference in the level of loneliness, and that the highest level of loneliness is in the students who spend 5 - 7 hours in social networks. Tutgun Ünal (2012) reports that the majority of university students are connected to social networks between 1 and 3 hours a day. Solmaz et al. (2013) reported that university students were connected to social networks in an average of 1-3 hours. Tektaş (2014) It is reported that 80% of university students are connected to social networks for one hour or more during the day and 15.8% spend 4 hours or more on social networks. Diker and Uçar (2016) reported that 49.5% of university students were connected to social networks over 4 hours. It is worth noting that university students have been spending more time on social Networks In the current study, students who spend time in social networks between 5 and 7 hours are experiencing the highest level of loneliness. Hence, spending too much time on social networks can also increase loneliness. Yalaz Seçim et al. (2014) stated that young people who spend too much time on social networking sites may be exposed to mental and physical negativity later on. Özen et al. (2010) reports that social networks are an important tool in sharing the loneliness of young people, and that they also lead them to loneliness in a sense with the addictive effect they have in them.

**Do peer relations of physical education and sport teacher candidates affect the level of loneliness?** In the current study, peer relations of physical education and sports teacher candidates seem to affect the level of loneliness (Table 7). Klicpera and Klicpera (2003) point out that experiences such as lack of friendship, inadequacy of family support, exclusion and rejection by a group of friends have triggered loneliness. The friendship experiences of children and adolescents differ in relation to depressive mood, self-esteem and loneliness (Berndt and Keefe, 1995, Bukowski, Hoza, and Boivin, 1993, Nangle, Erdley, Newman, Mason, and Carpenter, Asher, 1993). Towards the end of childhood and adolescence, this high level of friendship relations is positively related to self-esteem (Bagwell, Newcomb, and Bukowski, 1998) Whereas reductions in friendship associations on the other hand are reported to be related to psychological pressure, such as loneliness (Asher and Parker, 1993). Another dimension of your friendship is to tell how close you are to a person. Research suggests that the effects of close friendship are in the positive direction. Long-term studies show that the perceived quality of close friendship decreases the level of loneliness (Asher and Parker, 1993) and increases self-esteem (Berndt and Keefe, 1995). Akin and Akin (2015) report that increasing the level of friendship quality among university students increases the subjective happiness levels of individuals. When the findings are evaluated together, it can be said that the positive relationship of the person to the peers has an important influence in reducing the loneliness. It can be said that the physical education teacher has a positive influence on peer relations because of the social, sportive and playful forms of the profession. According to Balçioğlu (2003), sport is a very important means of communication that creates an opportunity to establish close relations with people. It is seen as a social behavior that addresses sports, body and spirituality. As a result of the study, there was no significant difference in loneliness levels between male and female participants in physical education and sports teacher candidates, while gender differences were found in favor of women in peer relations. From here it can be said that women have more intimate friendships. According to the classes, there was no significant difference in loneliness levels between male and female participants, while there was a significant difference in peer relations. This can be attributed to the fact that the curriculum of physical education and sport teacher education includes practical sports practices as well as theoretical courses. It can be said that friendship relations have increased due to the integration of practical lessons. It is seen that the highest peer relations in the physical education and sports teacher candidates are those who have more than 8 friends. At the same time, the level of loneliness is increasing due to the decrease in the number of friends. According to the time spent by physical education and sports teacher candidates on social networks, there is a difference in loneliness levels and the highest level of loneliness is seen in students who spend time in social networks between 5 and 7 hours. The loneliness of spending too much time on social networks can also be said to increase. This research, conducted on the candidates for physical education and sports, also draws attention to the characteristic characteristic of the profession of physical education teacher. It can be said that the profession of physical education teacher has the effect of having sportive applications with playful character, winning and losing feeling in sportive encounters all together, strengthening friendship ties and decreasing loneliness. It seems that current work in this area is inadequate. From this point, it is suggested to work again in physical education and sports teacher candidates and to make new studies about the subject in different sports groups.

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