



# The correlation between the empathy levels and interpersonal communication skills of social studies teacher candidates

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## Abstract

The present study aimed to determine the correlation between the empathy levels and interpersonal communication skills of social studies teacher candidates. The study adapted quantitative research design and the participants were composed of 114 (68 females, 46 males) social studies teachers candidates who were selected via convenience sampling, a purposive sampling method. The data were collected using the "Empathy level determination scale" adapted to Turkish language by Kaya & Çolakoğlu (2015) developed by Lawrence, et al. (2004) and the "Interpersonal communication skills scale" adapted to Turkish language by Cıkrıkçı & Çinpolat (2021) developed by Huang & Lin (2018). The obtained data were analyzed via the IBM SPSS 25 statistics software using such test as; arithmetic means, standard deviation the Kolmogorov-Smirnov test, and the non-parametric Spearman's rho test. In the study, the correlation between the empathy levels and interpersonal communication skills of social studies teacher candidates was analyzed via correlation analysis. The results revealed that based on the empathy levels scores the social studies teacher candidates had high emotional reaction levels, low social skills. In addition, based on interpersonal communication skills levels scores, it was understood that their listening skill levels were the highest, followed by empathy and expression skill levels, and their social comfort skills were the lowest. To sum up, it was found out that there was a positive medium-level and significant correlation between the empathy levels and interpersonal communication skills of the social studies teacher candidates.

**Keywords:** Social studies teacher candidates, empathy, interpersonal communication

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## 1. Introduction

Individuals should have certain skills to participate in social activities personally. These are diverse skills, particularly, such skills as empathy and interpersonal communication are quite necessary. These skills allow the individuals to conduct

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effective, healthy, productive and harmonious relations in the society. According to Ersoy & Köşger (2016), empathy is an emotion and behavior where an individual emotes the emotions of other individuals. Cuff, et al. (2014) described empathy as an emotional reaction based on interpersonal interaction. According to Decety & Jackson (2004), empathy is not only an idea about the emotional state of another individual, but having at least a minimal idea about the emotional state of various individuals. Similar to empathy, interpersonal communication skills are indispensable skills for individuals. In this process, the individual's internal processes and psychological state are quite important (Tekke & Coşkun, 2019). Psychological health positively affects interpersonal communication skills. Communication is a multi-dimensional process. It includes listening, comprehension, empathy, and expression dimensions. The interaction between these dimensions improves the communication and interpersonal communication skills of the individuals.

Empathy and interpersonal communication skills are closely associated. It is important for an individual to have high levels of these skills. The individuals start to acquire these skills after birth and these turn into professional skills during education. The acquisition of the empathy and interpersonal communication skills is aimed in several courses. Especially social studies course plays a significant role. Because the primary goal of social studies education is to train active citizens. Skill acquisition is significant in the training of active citizens. It is quite important for the individual to acquire empathy and interpersonal communication skills to be trained as functional individuals in the society. It is vital for social studies teachers, especially the teacher candidates, to possess good empathy and interpersonal communication skills to train active citizens. Because individuals could train others in these skills only when they possess them. Thus, teacher training process is quite important. It is a fact that teacher talk comprises some traditional way of teaching via rote and recitation, however, encouraging dialogue and discussion enables students to advance their higher-order thinking and co-construct knowledge (Yıldırım & Uzun, 2021). Determination of the levels of these skills across social studies teacher candidates and the correlation between these skills is vital in training healthy, active, and productive individuals. Therefore, the current study aimed to research whether there was a correlation between the empathy levels and interpersonal communication skills of social studies teacher candidates.

The literature review revealed several studies on empathy skills. Several studies were conducted on general properties of empathy (Elliott, et al. 2011; Cuff, et al. 2014; Ersoy & Köşger, 2016), others scrutinized empathy in general (Duan & Hill, 1996), the present and future of empathy (Hall, & Schwartz, 2019), addressed empathy in teacher training (Cruz, & Patterson, 2005; Arghode, Yalvac & Liew, 2013; Pala, 2008) and the impact of empathy training on empathy skills of primary school students (Yüksel, 2004). The literature on interpersonal communication skills investigated the role of emotional intelligence in the development of interpersonal communication skills (Petrovici, &

Dobrescu, 2014), the concept of interpersonal communication (Verderber, Verderber & Berryman-Fink, 2004), the employment of WhatsApp and interpersonal communication skills by private college students (Chan, Yong & Harmizi, 2020), the improvement of interpersonal communication skills of the students with problem-based learning approach (Khodijah, 2018), and the correlation between the positive thinking skills and interpersonal communication skills of college students (Karadağ, 2019). However, literature review revealed no study that investigated the correlation between the empathy levels and interpersonal communication skills of social studies teacher candidates. Aiming to fill a significant gap in the literature, the current study has been designed considering the following research questions:

- What are the empathy levels of the social studies teacher candidates?
- What are the interpersonal communication skill levels of the social studies teacher candidates?
- Is there a correlation between the empathy levels and interpersonal communication skills of the social studies teacher candidates?

## 2. Method

### 2.1. The research design

The research was designed based on the quantitative method. In the study, the correlation between the empathy levels and interpersonal communication skills of social studies teacher candidates was investigated with the relational screening design. Relational screening design reveals correlations and causality between at least two variables (Fraenkel, Wallen & Hyun, 2012).

### 2.2. The study group

The study group members composing of social studies teacher candidates, were assigned utilizing convenience sampling, a purposive sampling method. Their demographics are presented in Table 1.

Table 1. Demographic information about participants

		Students				Total
		Freshmen	Sophomore	Junior	Senior	
Gender	Female	12	21	17	18	68
	Male	16	5	15	10	46
Total		28	26	32	28	114

As seen in Table 1, 114 social studies teacher candidates participated in the study, and 68 were female and 46 were male. The study group included 28 freshmen, 26 sophomores, 32 juniors, and 28 seniors. The freshman, sophomore, and junior students were included since the primary goal of social studies education is to train active citizens; and thus, communication and empathy skills are necessary for social studies teacher candidates at every stage to train active citizens. Therefore, all undergraduate social studies teacher training students were included. No further criteria were determined in the assignment of study participants, and all volunteering social studies teacher candidates were included in the study.

### 2.3. Data collection and analysis

The study data were collected using the "*Empathy level determination scale*" adapted to Turkish language by Kaya & Çolakoğlu (2015) developed by Lawrence, et al. (2004) and the "*Interpersonal communication skills scale*" adapted to Turkish language by Cıkrıkçı & Çinpolat (2021) developed by Huang & Lin (2018). Data were collected from volunteering social studies teacher candidates with the surveys applied both face-to-face and on Google Forms. The study data were analyzed via the IBM SPSS 25 statistics software. The arithmetic means and standard deviation of the participants' responses to scale items were calculated, and the Kolmogorov-Smirnov test was employed to determine normal distribution of the data. In addition, the Q-Q plot graph and values such as skewness and kurtosis were also examined. Since the data distribution was not normal, the correlation analysis results were analyzed to determine the presence of a significant correlation between empathy level and the interpersonal communication skills scale scores with the non-parametric Spearman's rho test.

Cronbach's Alpha reliability coefficients were analyzed to determine whether the scales employed to measure empathy levels and interpersonal communication skills were reliable. The Cronbach's Alpha reliability coefficient of *the empathy level determination scale* was .704. This coefficient demonstrated that the scale was reliable. The Cronbach's Alpha reliability coefficient of *the interpersonal communication skills scale* was .767. This coefficient demonstrated that the scale was reliable.

## 3. Findings

Findings of the study are presented using the related tables as given below:

The arithmetic means and standard deviations of the empathy scale scores of the social studies teacher candidates are presented in Table 2.

Table 2. The arithmetic means and standard deviations of the empathy level scores of the social studies teacher candidates

Dimension		Item		Level	Dimension		Level
		X	S		X	S	
Cognitive empathy	Item 4	4,23	,86	Absolutely I agree	3,94	,64	I partially agree
	Item 9	4,08	,93	I partially agree			
	Item 11	3,81	1,11	I partially agree			
	Item 12	3,89	1,06	I partially agree			
	Item 13	3,68	1,07	I partially agree			
Emotional response	Item 6	4,49	,93	Absolutely I agree	4,34	,59	Absolutely I agree
	Item 7	4,35	,86	Absolutely I agree			
	Item 8	4,43	,86	Absolutely I agree			
	Item 10	4,07	,92	I partially agree			
Social skills	Item 1	4,32	,88	Absolutely I agree	3,68	,55	Absolutely I agree
	Item 2	3,70	1,15	I partially agree			
	Item 3	2,54	1,32	I partially disagree			
	Item 5	4,16	,95	Absolutely I agree			

As seen in Table 2, the mean score of the social studies teacher candidates was the highest in the emotional response ( $X=4.34$ ), followed by cognitive empathy ( $X=3.94$ ) and social skills ( $X=3.68$ ) levels of the empathy.

The arithmetic means and standard deviations of the interpersonal communication skills level scores of the social studies teacher candidates are presented in Table 3.

Table 3. The arithmetic means and standard deviations of the interpersonal communication skills level scores of the social studies teacher candidates

Dimension		Item		Level		Dimension		Level	
	Item	X	S			X	S		
Listening skill	Item 1	4,80	,63	Absolutely agree	I	4,55	,59	Absolutely I agree	
	Item 2	4,67	,76	Absolutely agree	I				
	Item 3	4,51	,83	Absolutely agree	I				
	Item 4	4,22	,91	Absolutely agree	I				
Social comfort skill	Item 5	3,89	1,01	I partially agree		3,77	,79	I partially agree	
	Item 6	3,68	1,26	I partially agree					
	Item 7	3,99	1,01	I partially agree					
	Item 8	3,54	1,29	I partially agree					
Empathy skill	Item 9	3,85	1,03	I partially agree		4,07	,67	I partially agree	
	Item 10	3,98	1,27	I partially agree					
	Item 11	4,12	1,04	I partially agree					
	Item 12	4,32	,85	Absolutely agree	I				
Expression skill	Item 13	3,71	1,22	I partially agree		3,98	,64	I partially agree	
	Item 14	4,29	,75	Absolutely agree	I				
	Item 15	3,96	,94	I partially agree					

As seen in Table 3, the mean score of the social studies teacher candidates was the highest in the listening skill ( $X=4.55$ ) the interpersonal communication skills, followed by the empathy skill ( $X=4.07$ ), expression skill ( $X=3.98$ ), and social comfort skill ( $X=3.77$ ) levels.

The findings of the normality test conducted on the scores of the social studies teacher candidates in the empathy and interpersonal communication skills scales are presented in Table 4.

Table 4. Normality test results for the scores of the social studies teacher candidates in the empathy and interpersonal communication skills scales

	Kolmogorov-Smirnov <sup>a</sup>		
	Statistic	df	Sig.
Empathy scale	,091	114	,021
Interpersonal communication skills scale	,093	114	,017

As seen in Table 4, the result of the Kolmogorov-Smirnov test conducted on the empathy scale scores was .021. Data distribution was not normal ( $p < 0.05$ ). Interpersonal communication competence scale Kolmogorov-Smirnov test result was .017, reflecting a non-normal distribution ( $p < 0.05$ ).

Table 5. Correlation between the empathy levels and interpersonal communication skills of the social studies teacher candidates.

#### Correlation

			Empathy	Interpersonal communication skills
Spearman's rho	Empathy	Correlation Coefficient	1,000	,531**
		Sig. (2-tailed)	.	,000
		N	114	114
	Interpersonal communication skills	Correlation Coefficient	,531**	1,000
		Sig. (2-tailed)	,000	.
		N	114	114

\*\* . Correlation was significant at 0.01 level (2-tailed).

As seen in Table 5, the result of the Spearman's rho test, which reflects the correlation between empathy and interpersonal communication skills of the social studies teacher candidates, was .531\*\*. Since  $p$  was less than 0.01, there was a positive medium-level and significant correlation between empathy and interpersonal communication skills at 99% confidence level.

## 4. Conclusion, Discussion and Recommendations

The following were determined in the study that aimed to investigate the correlation between the empathy levels and interpersonal communication skills of social studies teacher candidates.

It was concluded that the teacher candidates scored highest in the emotional response dimension of the empathy scale, followed by the cognitive empathy, and social skills dimensions. In general, empathy is the experience of subjective similarity between an individual and others without losing the sight of one's own emotions (Decety & Jackson (2004). Empathy includes both cognitive and emotional elements and occurs spontaneously in an individual. In empathy, one emotes and understands the feelings of another individual, despite the differences between these individuals. In empathy, the distinction between self and the other is conserved (Cuff, et al., 2014). Thus, it was natural that the highest scores were observed in the emotional response dimension in the study when compared to the other dimensions. According to Decety & Jackson (2004), empathy includes sharing of emotions, awareness of self and the other, and cognitive flexibility dimensions.

The social studies teacher candidates scored the highest points in the listening skill dimension of the interpersonal communication skills scale, followed by empathy skill, expression skill, and social comfort skill dimensions. Interpersonal communication skills are required in all realms of the lives of individuals. An individual with interpersonal communication skills could lead a successful social life (Singh, 2014). Thus, individuals should have high interpersonal communication skills. It is important for the college students in social studies education departments to have these skills to train active citizens and to conduct healthy social lives. A social studies teacher with these skills could significantly contribute to the education of productive individuals. According to Karadağ (2019), an individual with an optimistic and positive mindset establishes and produces positive relations in social life. Since positive thinking requires collaboration, it could be suggested that individuals with such ideation possess interpersonal communication skills. According to Kavut (2018), listening, an interpersonal communication skill, is an important element both in the establishment of effective communications among individuals and prevention of communication conflicts. Thus, it was a significant finding that the social studies teacher candidates scored the highest in the listening skills dimension of the interpersonal communication skills scale.

The study findings demonstrated that there was a positive medium-level and significant correlation between the empathy levels and interpersonal communication skills of the social studies teacher candidates. Currently, the inability of individuals to employ empathy skills is at the root of personal problems. Empathy plays a key role in understanding one another and prevents the development of communication problems between the individuals. Thus, empathy minimizes interpersonal conflicts. Just as intelligence is important for the cognitive development of individuals, empathy is also quite important in interpersonal communication (Ersoy & Köşger, 2016). Furthermore, empathy is a basic component of social and emotional lives of individuals. In a way, empathy is a relationship established without attachment in the society (Decety & Jackson (2004). Empathy does not require a close emotional bond. Thus, empathy is



necessary to establish healthy interpersonal communications in the society. Empathy occurs even when the individual does not know the other individual, allowing the individual to establish healthy interpersonal communications.

The following could be recommended based on the study findings: It was determined that the scores of the social studies teacher candidates were the highest in the emotional response dimension of the empathy scale, followed by the cognitive empathy, and social skills dimensions. Activities and practices that would improve the cognitive empathy and social skills of the teacher candidates could be included in teacher training.

The student teachers achieved the highest interpersonal communication skills scores in the listening skill dimension, followed by empathy skill, expression skill, and social comfort skill dimensions. The interpersonal communication skills of the teacher candidates could be improved by including applications that would improve the dimensions where the participant scores were low in teacher training.

In the study, it was determined that there was a positive correlation between the empathy levels and interpersonal communication skills of the social studies teacher candidates. Thus, opportunities could be created for teacher candidates to attend practical activities that would integrate these two skills. In other studies to be carried out, it can be determined whether there is a relationship between different skills of social studies teacher candidates.

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