INTERACTION BETWEEN ACADEMIC RESILIENCE AND ACADEMIC ACHIEVEMENT OF TEACHER TRAINEES

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Abstract

This study sought to explore the interaction between academic resilience and academic achievement as measured by Grade Point Average (GPA). To this end, the Academic Resilience Scale (Cassidy, 2016) consisting of 30 items and scored on a 5-point Likert scale was administered. The overall reliability of the scale was .79 and the reliability coefficients for the three sub-scales were above .70. Student GPAs (M= 2.50, SD= .51) were procured by a self-report item. The sample of the study consisted of 198 preservice English language teachers at a foundation university in Turkey. Descriptive results showed that participants scored highest on reflecting and adaptive help-seeking (M= 3.77, SD= .58). It was followed by perseverance (M= 3.44, SD= .41) and negative affect and emotional response (M= 2.90, SD= .69) dimensions. Moreover, positive correlations were revealed between GPA and perseverance (r= .20, p <.05) and reflecting and adaptive help-seeking (r= .37, p<.01). The results of the multiple regression analysis manifested reflecting and adaptive help-seeking to be the only significant predictor of GPA.

Key words: Academic resilience, achievement, teacher trainees

1. Introduction

According to the statistics provided by the Higher Education Council (n.d.), the number of students suspending or dropping out of their associate or undergraduate studies is on the rise especially in the last decade in Turkey. This statistic can be attributed to certain personal and scholastic factors. Şimşek (2013) reports that gender, attendance, out-of-school work, boredom at school, and disciplinary penalty as personal factors associated with undergraduate dropout whereas faculty type, level of program difficulty, willingness to choose the faculty, satisfaction with social activities and administrative and teaching staff were listed among the scholastic factors. Besides, change of residence and new social environment (Peer, Hillman, & Hoet, 2015; Karahan, Sardoğan, Özkamalı & Dicle, 2005) were among other challenges identified by scholars. In the same vein, Tinto (1996) stated that goal uncertainty, financial difficulties, sense of isolation, and an inefficacy to negotiate the transition between secondary and tertiary level of education or commitment to a degree program as some other possible reasons for student attrition in higher education. Such factors as can lead to disequilibrium, high levels of stress, dissatisfaction, and poor academic performance (Franco Taboada, 2015; Peer, Hillman, & Hoet, 2015) on part of some students.

As a matter of course, while there are students that achieve less and continue to perform poorly and fail, there are also those who turn their academic misfortunes around, flourish, and thrive notwithstanding adversity (Martin & Marsh, 2006). Such students are called resilient. Typically, resilience has been described as the capacity for positive or successful adaptation (Glennie, 2010; Howard & Johnson, 2000; Luthar, Cicchetti, & Becker, 2000; Masten, Best, & Garmezy, 1990; Riley & Masten, 2005; Waxman, Gray, & Padron, 2003) when faced with

hardship. Other scholars have defined it as the ability to cope with (Cassidy, 2016) and pull oneself together, recover, and return to the pre-adversity state (Smith, Dalen, Wiggins, Tooley, Christopher, & Bernard, 2008) in face of challenge and adversity. It is considered as a positive entity with positive effects on an individuals' successful functioning (Bartley, Schoon, Mitchell, Blane, 2010; Cassidy, 2016).

The concept of resilience has received great attention in social sciences research focusing on individuals with adverse life conditions, experiences, or contexts (Masten, 2001), but academic resilience has yet to receive the rightful attention. Besides, as argued by Montero-Hernandez, Levin, and Diaz-Castillo (2014), most studies worldwide have concentrated on samples in unfavorable conditions. Whereas some researchers concentrated on students with socio-economic difficulties (Aydın, 2017; Buslig, 2019; Çokluk, Gül, & Kayri 2016; Gizir & Aydin 2009; Seban & Perdeci 2016; Yavuz & Kutlu 2016), some focused on students at risk (Abukari 2018; Annalakshmi, 2019; Lee 2009; Novotny & Kremenkova 2016; Zuill 2016). There are also studies that centered upon minority (Britton 2018; Gross, 2011; Fallon, 2010; Perez-Brena, Sang, Kuo, Jesus, Updegraff, & Umana-Taylor, Mchale, 2018) and immigrant (Kumi-Yeboah, 2016; Mbindyo, 2011) students. However, as argued by Martin and Marsh (2006), it is relevant to all students since poor performance, adversity, challenge, or pressure are common experiences in educational life. The case for teacher trainees is no different. Besides the academic challenges related to their teacher training program which is characterized by cognitive and emotional demands (Danner, 2014), preservice teachers also attend to practicum in the final year of their teacher training program; which is a challenging task in itself (Durksen & Klassen, 2012).

2. Literature Review

In this section, literature in the field that is related to this study will be covered. In this respect studies that focus on gender differences in academic resilience and research on the relationship between academic resilience and achievement will be reviewed.

2.1. Gender differences in academic resilience

There are studies that focus on gender differences in academic resilience. In a study carried out with 9th and 12th grade students (n=559) in the Midwest, Wasonga (2002) revealed higher resiliency scores for girls. In Sun and Stewart's (2007) study undertaken with 2492 Australian students attending 3rd and 7th grades, significant gender differences were revealed in favor of females in communication, empathy, help-seeking, and goals and aspirations aspects of resilience. Similarly, Mbindyo's (2011) results showed that females were more resilient in a sample of 106 ethnically diverse minority students at an intervention program. McLafferty, Mallet, and McCauley (2012) descriptive results also ascertained that females had higher academic resilience levels among 117 undergraduate students from Northern Ireland. On the other hand, Çelik (2013) found that gender differences in favor of female students among 11th and 12th grade Turkish high school students with respect to resilience sub-factors optimism/conduct of life, communication/relationship building, and being a researcher. In a study that included inductees from a university in the UK, Allan, Mckenna, and Dominey's (2014) four-stage analysis revealed incremental resilience to be more facilitative for female students' academic attainment compared to their male counterparts. In a study carried out with 333 Turkish undergraduates of music education females scored significantly higher in their perception of self, perception of the future and social resources subdimensions (Yokuş, 2015). Significant gender differences were also revealed in favor of females in Kenya by Mwangi and Ireri (2017) and Mwangi, Ireri, Mwaniki, and Wambugu (2018) with a sample of 390 secondary school students. The study of Chisholm-Burns, Spivey, Sherwin, Williams, and Phelps (2019)

also unearthed gender differences in favor of female students on reflecting and adaptive help-seeking dimension of academic resilience among a sample of pharmacy students.

Contrary to aforenamed studies, there are also researches that revealed results in favor of male students. In a study carried out with 402 Australian high-school students, Martin and Marsh (2006) concluded males as more resilient. Similarly, Martin and Marsh (2008) found that male students scored significantly higher among 598 students in grades 8 and 10 at five Australian high schools. In another study with 127 secondary school students Sarwar, Inamullah, Khan, and Anwar (2010) found males to be more resilient compared to their female counterparts. Similarly, in Ulker Tumlu's (2013) study carried out with 735 undergraduate students attending the Faculty of Education of a Turkish University, resilience levels of students differed according to gender in favor of males. In another study carried out in Turkey with 596 undergraduate students, Erdogan, Ozdogan, and Erdogan (2015) ascertained that gender differences in favor of males. Moreover, the gender effects in the same direction were also found to be significant for sub-dimensions being powerful, being entrepreneur, foresight, achieving the goal, being a leader, and being a researcher. In study carried out with 304 12th grade students, Yavuz and Kutlu (2016) also found that females were significantly more resilient.

Moreover, there are also studies that revealed insignificant results with respect to gender differences. For example, using NELS 88 data and including 1803 minority students in grades 8 through 12, Finn & Rock (1997) found no significant differences with respect to gender differences in students' resilience. In the same vein, Özcan (2005) found no gender difference with respect to gender among 152 Turkish high school students. The study of Elizondo-Omana et al. (2010) also found no gender differences regard academic resilience among 113 regular and 69 remedial medical students. In a study performed with the participation of Turkish primary school students, there were no gender-based differences (Baltacı & Karataş, 2015). Cassidy (2015; 2016) also found no gender differences in resilience levels among British undergrad students. In a study conducted in India with 125 students from a public school, Rao and Krishnamurthy (2018) also found indifference between girls and boys with respect their resilience attributes.

2.2 Academic resilience and achievement

Correlational and predictive relationships between academic resilience and achievement are also evident in the literature. For example, in a study carried out in Iran, Abolmaali and Mahmudi (2013) with 384 female high school students of resilience was found to significantly predict academic achievement. Similarly, Foshee (2013) revealed academic resilience as a predictor of academic performance in combination with other affective attributes among college Students in a remedial mathematics course. Likewise, Kotzé and Kleynhans (2013) determined resilience as a significant predictor of academic performance among 789 first-year students at a South African university. In a research undertaken with 420 first-year students at an Australian university, Kwek, Bui, Rynne, and So (2013) found resilience to be a significant predictor of academic performance. In another study, Novotný and Křeménková (2016) determined resilience as a significant predictor of academic performance among 467 students aged between 15 and 21. In Sadoughi's (2018) study, academic resilience had a positive and moderate level of correlation with and also significantly predicted academic performance in a sample of 220 Iranian medical students. In a study carried out with 748 first year students in Spain, Ayala and Manzano (2018), hardiness and resourcefulness dimensions of resilience were found to predict academic performance. Similarly, Rodríguez-Fernández, Ramos-Díaz, and Axpe-Saez (2018) found evidence in support of the predictive influence of resilience on perceived performance among 945 secondary school students in Spain.

On the other hand, in a correlational study carried out with 162 Psychology students at a university in the UK, a positive relation was revealed between resilience and academic achievement (Solomon, 2013). In a study carried out in Kenya, Mwangi, Okatcha, Kinai, and Ireri (2015) also revealed a positive and significant relationship between academic resilience and academic achievement among 390 secondary school students. A significant positive relationship was also established between resilience and academic achievement in the study of Yokuş (2015). Based on PISA 2012 mathematics performance data and including a random selection of 4848 students aged 15, Yilmaz Findik (2016) concluded that almost all the 322 resilient students' mathematics performance was above baseline in Turkey. Moreover, a significant positive relationship between resiliency and reading achievement was determined in the study of Zuill (2016). In a study done by Britton (2018) with high school students with minority backgrounds a weak positive correlation was determined between resilience and achievement. In the same vein, Rao and Krishnamurthy's (2018) study revealed a high positive relationship between resilience and scholastic performance. Hernandez, Escobar, Fuentes, and Eguiarte (2019) too found a weak positive relationship between resilience and achievement in a sample of 288 Mexican students aged between 18 and 25. Likewise, Öz (2019) revealed a weak positive correlation between academic resilience and achievement among 88 preparatory school students of English Language Teaching and English Language Literature. A weak positive relationship was also reported by Trigueros, Aguilar-Parra, Cangas, Bermejo, Ferrandiz, and López-Liria (2019) in their study that included 615 secondary school students attending Physical Education classes. In a recent study conducted by Toprak Çelen (2020), perseverance, negative affect and emotional response, and reflecting and adaptive help seeking as academic resilience sub-dimensions were found to be statistically significant correlates of mid-term averages in a sample of 436 Turkish foreign language preparatory school students. Her study found perseverance as a negative correlate of student success whereas negative affect and emotional response and reflecting and adaptive help seeking were positive correlates.

On the other hand, some studies revealed no interactions between academic resilience and achievement. In Wasonga's study (2002) higher resiliency scores did not ensure an edge in academic achievement. In a study carried out with medical students, Elizondo-Omana, Garcia-Rodrigues, and Guzman Lopez (2007) academic resilience was found not to predict academic success. A similar result was revealed in Elizondo-Omana's (2010) study. Sarwar, Inamullah, Khan, and Anwar (2010), on the other hand, found no correlation between resilience and academic achievement among secondary school students. In a study performed with psychology undergraduates in the UK by Cheng and Catling (2015) also found that resilience was found to not predict achievement. Undertaking a study with 51 Bermuda foster care students aged between 12 and 17, Zuill (2016) found no relationship between resiliency and GPA and resiliency and math achievement. In another study, which was based in Czech Republic, academic resilience did not predict academic performance among 97 international students (Smejkalová, 2018).

As evident from the above discussion of studies, neither the results in gender differences regard academic resilience nor findings on its relationship with academic achievement are conclusive. Besides, there are no studies to our knowledge that focused on preservice English teachers studying beyond their preparatory English language courses. Therefore, the present study aims to investigate gender differences in academic resilience and its interaction with academic achievement by seeking answer to the following research questions:

1. What is the academic resilience make-up of the teacher trainees?

2. Do female and male teacher trainees differ in terms of their level of academic resilience?

3. What is the relationship between academic resilience and academic achievement?

4. Can academic achievement be predicted by any dimension of academic resilience?

3. Methodology

In this section, the research design, setting, participants, data collection instruments, procedures for data collection and analysis regard the current study will be described.

3.1. Research design

A cross-sectional survey research design was adopted in this study. It provides for the investigation of a construct by addressing questions related to facts or opinions about this construct to a sample from a larger population using several means of data collection like questionnaires, interviews, and observations (Griffee, 2012) that are administered at one point in time (Cresswell, 2012). To that end, a questionnaire was administered to a group of preservice English teachers to search answers to the proposed research questions.

3.2 Setting and participants

The current research was carried out with 198 undergraduate students. The students were enrolled in the English Language Teaching program of a foundation university in Ankara, Turkey. Participation in the study was on a volunteer basis. Participants were admitted to their undergraduate program via their scores on the centrally administered university entrance exam. Therefore, it is fair to consider them as a homogeneous group. Among the 198 students that took part in the study, 137 (69%) of them were female whereas 61 (31%) of them were males and their ages ranged between 18 and 34 (M= 21.65, SD= 2.54).

3.3. Instruments

A questionnaire that consisted of two parts was utilized as a data collection instrument in the study. These were the demographic information form and the academic resilience scale (Cassidy, 2016). Details regarding the instruments will be discussed below.

3.3.1. Demographic information form

The demographic information form was the first section of the questionnaire. It asked participants to state their age, gender, and grade point average (GPA). GPA was utilized as a measure of achievement since it is acknowledged as a reliable standard of undergraduate academic success (Beatty, Walmsley, Sackett, Kuncel, & Koch, 2015).

3.3.2. Academic resilience scale

The academic resilience scale is an instrument developed by Cassidy (2016) that reflects the construct's multidimensional nature. It aims to quantify academic resilience levels of students concerning their responses to academic hardship and is composed of 30 items scored on a 5-point Likert scale ranging from unlikely (1) to likely (5). It consists of 14 items related to perseverance, 9 items about reflecting and adaptive help-seeking, and 7 items on negative affect and emotional response. The reliability coefficient for the perseverance, reflecting and adaptive help-seeking, and affect and emotional response sub-dimensions were .71, .76, and .72 respectively. Overall, the overall Cronbach's reliability coefficient for the scale was .79. The reliability coefficients for the sub-dimensions and the overall scale were acceptable (Hulin, Netemeyer, & Cudeck, 2001).

3.4. Procedures for data collection and analysis

Data were collected in the Spring semester of the 2018-2019 academic year from students studying at the English Language Teaching department of a foundation university who wished to participate in the study by distributing and recollecting printouts of the demographic information form and Academic Resilience Scale (Cassidy, 2016) during class hours. Data

were collected in the Spring semester to make sure that the GPAs of first-year students were determined. Emerging data was entered into SPSS 22 and checked for possible entry errors and missing values. There were no entry errors. Considering the missing value analysis, missing values for scale items were replaced by the mean values of remaining responses to the items. Next, measures of central tendency (mean) and dispersion (standard deviation) were calculated and used to specify the GPAs and resilience levels of the participants. Prior to analyzing the data for possible gender differences in academic resilience dimensions, assumption checks were carried out to determine the appropriate type of analysis as specified by Morgan, Leech, Gloeckner, and Barrett (2011). Data were considered as independent since genders are not matched. The variances of the dependent variables in the gender categories were ascertained to be equal via the Levene's test and the boxplots and stem-and-leaf plots showed that the dependent variables were normally distributed within each category. Therefore, an independent samples t-test was used to determine whether female and male participants differed in regard to different dimensions of academic resilience. Associational relationships between GPA and academic resilience dimensions were determined via the Pearson product moment correlation because the data was normally distributed, free of outliers, and variables had a linear relationship (Morgan, Leech, Gloeckner, & Barrett, 2011). Lastly, the causal relationships between types of academic resilience dimensions and GPA were uncovered using a bivariate linear regression analysis after the data was found fit in prior analyses.

4. Results

This research submits an attempt to unearth gender differences in GPA and academic resilience among preservice English teachers, to analyze the relationships between academic resilience and GPA, and to evince the role played by academic resilience in predicting GPA. Within this scope, the findings of the research are presented below.

4.1. Descriptive findings

In this section descriptive data regards students' academic achievement levels and academic resilience levels will be presented.

4.1.1. Academic achievement

Descriptive data with respect to academic achievement levels of the participants as measured by their self-reported GPA showed that the academic achievements of students were above average (M= 2.50, SD= .51). Furthermore, GPAs of female preservice teachers (M= 2.55, SD= .48) were higher than that of their male counterparts (M= 2.36, SD= .56).

4.1.2. Academic Resilience

In order to reveal the academic resilience make-up of the participants, descriptive statistics with respect to three types of academic resilience were computed. The results are presented in Table 1.

Table 1. *Descriptive statistics for resilience types*

	Whole		Female		Male	
Type of resilience	M	SD	M	SD	M	SD
Negative affect and emotional response	2.90	.69	2.88	.64	2.96	.79
Perseverance	3.44	.41	3.44	.38	3.44	.48
Reflecting & adaptive help-seeking	3.77	.58	3.80	.55	3.72	.64

N= 198, n_{female}= 137, n_{male}= 61

As it can be observed from Table 1, an analysis of the scores of the whole population showed that reflective and adaptive help-seeking (M= 3.77, SD= .58) was the highest resilience type followed by perseverance (M= 3.44, SD= .41). Moreover, negative affect and emotional response (M= 2.90, SD= .69) was the least dominant resilience type exhibited among variables of academic resilience. On the other hand, when the gender-wise descriptive findings regard academic resilience types are examined, males (M= 2.96, SD= .79) scored higher on negative affect and emotional response compared to their female counterparts (M= 2.88, SD= .64). With respect to perseverance the mean values of females (M= 3.44, SD= .34) and males (M= 3.44, SD= .48) were equal. With respect to reflecting and adaptive help-seeking behaviors, on the other hand, female participants (M= 3.80, SD= .55) scored higher than male participants (M= 3.72, SD= .64).

4.2. Inferential Findings

In this section results of the analyses regards, gender differences regard academic resilience, the relationship between academic resilience dimensions and student GPA, and the determinant(s) of GPA will be presented.

4.2.1. Gender differences with respect to academic resilience

To ascertain gender differences in academic resilience, first the descriptive statistics were computed. Relevant statistics are presented in Table 2 below.

Table 2. *Descriptive statistics for academic resilience types with respect to gender*

	Female		Male	
Dimensions of resilience	M	SD	M	SD
Negative affect and emotional response	2.88	.64	2.96	.79
Perseverance	3.44	.38	3.44	.48
Reflecting & adaptive help-seeking	3.80	.55	3.72	.64

N=198

To determine whether the gender differences in motivation types observed above are statistically meaningful, an independent samples t-test was conducted, and the results are presented in Table 3.

Table 3. *T-test results for gender differences with respect to resilience dimensions*

	Female		Male				
Dimensions of	M	SD	M	SD	t	Df	p
Negative affect and emotional response	2.88	.64	2.96	.79	.60	196	.55
Perseverance	3.44	.38	3.44	.48	-.11	196	.99
Reflecting & adaptive help-seeking	3.80	.55	3.72	.64	.72	196	.47

N=198

An examination of Table 3 shows that there were no significant gender differences in perseverance (female M= 3.44, SD= .38; male M= 3.44, SD= .48), t(196)= -.11, p > .05); reflecting and adaptive help-seeking (female M= 3.80, SD= .55; male M= 3.72, SD= .64), t(196)= .72, p > .05); and negative affect and emotional response (female M= 2.88, SD=.64; male M= 2.96, SD= .79), t(196)= .60, p > .05).

4.2.2. Relationship between academic achievement and academic motivation

To assess the relationship between academic achievement represented by participants' GPA and academic resilience, Pearson's correlation coefficients were computed. Results of the analysis is presented in Table 4.

Table 4. *The relationship between academic achievement (GPA) and academic resilience*

	1	2	3	4
1. GPA	1			
2. Negative affect and emotional response	-.12	1		
3. Perseverance	.20*	.31**	1	
4. Reflecting & adaptive help-seeking	.37**	-.01	.65**	1

*p<.05, **p<.01, N=198

As it can be observed from Table 4, GPA correlated positively with perseverance (r = .20, p < .01) and reflective and adaptive help seeking (r = .37, p < .01).

4.2.3. Predictors of academic achievement with respect to types of academic resilience

After establishing statistically significant correlations between academic achievement as represented by students' GPAs and perseverance and reflecting and adaptive help-seeking a regression analysis was conducted after determining that data was fit to implement the analysis with respect to normality, linearity, multicollinearity, and homogeneity of variance. Results of the regression analysis are presented in Table 5 below.

Table 5. *Regression analysis for motivational predictors of achievement*

Predictor	B	SE B	B	T	P
Perseverance	-.01	.01	-.06	-.56	.58
Reflecting & adaptive help-seeking	.04	.01	.41	3.68	.00

F(2, 195)= 9.71, p= .00, adjusted R²= .12, R²= .14, N=198

As it can be observed in Table 5, among the resilience types entered into the model, reflecting and adaptive help-seeking was determined to be the only predictor of GPA (F(2,195)= 9.71, p< .05) and it explained 14% of variation in GPA (R²= .14).

5. Discussion

These is a growing number of studies concentrating on academic resilience, but to our knowledge, research on preservice English teachers' academic resilience in relation to gender differences and their achievement is non-existent. Therefore, this study was carried out to fill this gap in the related line of literature and contribute to the existing line of literature on gender differences in academic resilience as well as those on the relationship between academic resilience and achievement.

The results showed that participants engaged mostly with reflecting and adaptive help seeking, followed by perseverance and negative affect and emotional response in terms of academically resilient behaviors. This denotes that when faced with academic challenges, participants mainly preferred to monitor their academic endeavors, pondered on their strengths and weaknesses, changed their way of study, requested help and support, and implemented rewards and punishments (Cassidy, 2016). This comes to no surprise as reflection and adaptive help seeking behaviors are facilitative in that they can enable students to make meaning of their

educational experiences, foster continuity of learning and individual development (Rodgers, 2002) as well as fostering positive emotions (Ryan, Patrick, & Shim, 2005; Shim, Rubenstein, & Drapeau, 2016), increased academic engagement (Shim, et al., 2016), and enhanced understanding of course content (Karabenick & Knapp, 1991).

The results also showed no gender differences with respect to any dimension of academic resilience. Whereas this result is consistent with some previous studies (Baltacı & Karataş, 2015; Cassidy, 2015, 2016; Finn & Rock, 1997; Özcan, 2005; Rao & Krishnamurthy, 2018), there are other studies that contradict our finding (Allan, McKenna, & Dominey, 2014; Chisholm-Burns, Spivey, Sherwin, Williams, & Phelps, 2019; Çelik, 2013; Erdogan, Ozdogan, & Erdogan, 2015; Martin & Marsh, 2006, 2008; Mbindyo, 2011; McLafferty, Mallet, & McCauley 2012; Mwangi et al.,2018; Mwangi & Ireri, 2017; Sarwar et al., 2010; Sun & Stewart, 2007; Ulker Tumlu, 2013; Wasonga, 2002; Yavuz & Kutlu, 2016; Yokuş, 2015). The inconsistent results regard gender differences in academic resilience can be attributed to both the variations in the data collection tools used in different studies and the diverse samples used in these studies. Moreover, the insensitivity of current measures of resilience as argued by Hirani, Lasiuk, and Hegadoren (2016) might yet be another cause behind these mixed results.

Moreover, with respect to the relationship between resilience dimensions and GPA, negative affect and emotional response, contradictorily to the study of Toprak Çelen, (2020), had an insignificant negative relationship with GPA denoting that factors like anxiety, catastrophizing, avoiding negative emotional responses, optimism, and hopelessness were not instrumental in predicting GPA. This result may be attributed to Cumulative Grade Point Average (CGPA) being the main measure in determining academic credit restrictions and GPA being taken into account only in academic progression from the fourth semester to the fifth (Official Gazette of the Republic of Turkey, 2017); resulting in the neutralization of the weak negative relationship between this dimension and GPA.

In addition, the perseverance dimension was found to have a positive relationship with GPA. Perseverance as an individual characteristic has been previously determined as a key determinant of middle school and undergraduate achievement (Park & Peterson, 2009). Besides, the result obtained in this respect is also in line with studies carried out in the field of education by Strayhorn (2014), Kutlu, Kula-Kartal, and Şimşek (2017). However, it contradicts the significant negative relationship determined by Toprak Çelen (2020). The positive relationships determined support the idea that perseverance is facilitative when students try to improve their skill or when faced with difficulties (Kutlu, Kula-Kartal, & Şimşek, 2017). As the participants in this study were putting in effort to improve their foreign language and teaching skills and were faced with academic challenges relevant to all undergraduate students this result seems reasonable.

Lastly, the reflecting and adaptive help seeking dimension was determined to be a correlate and sole determinant of student success as measured by GPA. This result in line with Toprak Çelen (2020) who found a similar relationship between the variables. The result comes to no surprise as this dimension involves ruminating on strengths and weaknesses, emending ways of study, seeking assistance, reviewing effort and success, and implementing rewards and punishments. In other words, it involves initiative taking on part of the students to evaluate their academic situation and seek learning support both of which were found to be associated with improved academic achievement (Lew & Schmidt, 2011, Schenke, Lam, Conley, & Karabenick, 2015).

7. Conclusion

The results of the study demonstrated that reflecting and adaptive help seeking was the dominant type of academic resilience behavior undertaken by preservice English teachers followed by perseverance, and negative affect and emotional response. In this respect programs can be designed to train students to get them acquainted with the concept of resilience, develop their resilience skills, and apply these when and where necessary. With respect to gender differences in academic resilience dimensions, insignificant results were obtained. Therefore, it might be practically sound not to exclude any gender category when carrying out practices to foster resilience in students. Moreover, correlational analysis showed that negative affect and emotional response was a negative but insignificant correlate of GPA. Even though the result in this respect was insignificant it can be sound not to overlook the effect negative affect and emotions can cast on student success. On the other hand, perseverance was positively linked with GPA. This points to the importance of motivating students and making them believe in their own strengths and the value of professional academic help when facing difficulties. The study also determined reflecting and adaptive help seeking as a significant correlate of GPA as well as its only significant determinant. This results pints out to the importance of self-reflection, flexibility, help-seeking, self-monitoring, rewarding and punishing oneself. In this respect students can be trained in self-reflection, self-monitoring, and learning strategies, informed about academic help opportunities available in their institution, encouraged to visit these offices when faced with academic hardship.

Furthermore, it should be kept in mind that this study was utilized with a limited sample size and with a specific group of students composed of teacher trainees of the English language. Therefore, further studies can and should be conducted with similar and diverse groups of students at different levels of education. Additionally, longitudinal research on academic resilience can also unearth valuable insights. It should also be noted that this study was based on quantitative data. Future qualitative studies may be conducted to have a better understanding of academic resilience. First and last, academic resilience is an important concept in education irrespective of the educational level, gender, or age of the students and should be researched extensively to expand our understanding of the concept and to find ways to utilize it as a trainable personal characteristic to promote positive learning outcomes.

8. Conflict of Interest

The author declares that there is no conflict of interest.

9. Ethics Committee Approval

The author confirms that the study does not need ethics committee approval according to the research integrity rules in their country.

10. Acknowledgements

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