



Determination of the Attitudes of Postgraduate Students Toward Academic Ethical Values

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Abstract

The aim of this study is to determine the attitudes of postgraduate students toward the academic ethical values. This is a quantitative research that uses the survey model and total of 345 postgraduate students consisting of 272 graduate and 73 PhD students that are studying in the various universities in Turkey in the academic year of 2019/2020 constitute the sampling of this study. To acquire data that is going to be used in the study, "Personal Information Form" which was prepared by the researcher and "Academic Ethical Values Scale" (AEVS) that includes 50 articles in the type of 5 point likert and whose validity and reliability studies have been done were used. As a conclusion of this study, it has been found that the postgraduate students have a mediocre attitude scores toward the academic ethical values. The postgraduate students' attitudes toward the academic ethical values were examined according to the variables of gender, age, mother's educational status, father's educational status, institution and active educational status. In line with the analysis of sub-problems, it has been acquired that the attitudes toward the academic ethical values differs meaningfully according to the gender variable, and does not differ according to the variables of age, mother's educational status, father's educational status, institution and active educational status. As an another conclusion of the study, it has been found that there is a weak relationship between the attitude values of postgraduate students and the variables of gender, age, mother's educational status, father's educational status, institution and active educational status.

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Introduction

Higher education institutions are seen as places that enable individuals to have professions according to their interests with educational services and train scientists who are in charge of producing scientific knowledge. Although these are not the only duties of higher education institutions and the academicians working here, they allow the training of future faculty members with masters and doctoral education. The ability of scientific research methods given to graduate and doctoral students who take the first step towards becoming academicians becomes important at this point (Erdem, 2012). Higher education institutions are seen as places that enable individuals to have professions according to their interests with educational services and train scientists who are in charge of producing scientific knowledge. Although these are not the only duties of higher education institutions and the academicians working here, they allow the training of future faculty members with masters and doctoral education. The ability of scientific research methods given to graduate and doctoral students who take the first step towards becoming academicians becomes important at this point (Erdem, 2012).

Individuals are part of the social environment in which they are located and they have some responsibilities to that environment. Honesty and trust are very important in gaining a place in the society in which individuals are located. Social values are an important place in social life as well as in the academic community where scientific knowledge is produced. Because science also covers the environment and people involved in research not just because of its result benefits society. At this point the scientist's responsibilities to the environment in terms of social values are increasing (TÜBA, 2002). In this context every individual who wants to produce scientific knowledge encounters some rules and ethical principles in research in which living things or living things are involved in the process (Yıldırım and Şimşek, 2016, p.99).

Ethics is a field of philosophy that examines the rules that individuals must follow concerning their behavior in the society in which they are located and the values of the cultural structure in which they are located (Sönmez and Alacapınar, 2011, p.204). According to Kuçuradi (2003) ethics is a logical explanation of how we react to unpredictable events that occur in our daily lives the method that we should follow when conducting research and the posture that we should take in this research by examining with reason. Academic ethics are also involved in the production of scientific knowledge, ensuring the protection of the rights of science, participants, researchers, and society. Neglecting responsibilities related to the professional life of the scientist, their institution, and their work colleagues by not being in harmony with the attitude of disrespect towards the institution to engage in behavior that will erode the credibility of research are observed between the inappropriate use of financial resources in academic unethical behaviors (TÜBA, 2002).

Individuals who produce scientific work have certain responsibilities to the scientific world. These responsibilities are the basic principles that make up the ethics of science and today these principles are used when conducting research in many disciplines. These basic principles;

Honesty: It is the sharing of the results of the study impartially without deflecting the truth and accuracy of the information obtained when the study is started.

Attention: The importance of the work done is to maintain the work in a precise way from beginning to end, showing the necessary sensitivity in this regard without forgetting.

Openness: After impartially sharing the results of the study with the scientific world feedback from readers about the study is thus ensuring the development of scientific knowledge.

Freedom: A scientist is free to observe the rights of other people in doing the work he wants.

Responsibility for Education: It is a situation where you do not only keep information to yourself but also have a say in the education of other people by sharing them.

Social Responsibility: Achieving results that will benefit society.

Legality: At every stage of the research, certain bureaucratic rules must be followed.

Mutual Respect: To take into account the work of colleagues to carry out their communication within the rules of respect.

Efficiency: Information, information sources, most importantly, is the case of efficient use of time.

Respect for Subjects: To prevent harm in studies by not forgetting that subjects participating in the research have a private life (Büyüköztürk, Çakmak, Akgün, Karadeniz and Demirel, 2018, p.29-30).

It is natural that some ethical problems arise in studies in which living beings are involved in the research process but if we conduct the study in accordance with rigor and ethical rules these problems will be minimized. As a matter of fact it seems from time to time that a scientific study in real life does not always progress in this way. In the field this situation is expressed as unethical behavior in science. Types of this behavior;

Undisciplined Research: This is a situation where some problems inadvertently occur in poorly planned and sloppy studies.

Duplication: Sending the work to multiple journals at the same time due to the desire to publish a lot in a short period of time.

Falsification: Defined as the researcher's use of user data to strengthen the results of the study and exclude those that do not work.

Fabrication: This is the conduct of research by changing data by using the desktop method.

Plagiarism: Explained as using ideas that belong to someone else as if they belong to us (Yıldırım and Şimşek, 2016, p.109; Büyüköztürk, et al., 2018, p.31).

In the field of academic ethics national and international studies are conducted for academics, undergraduates, and graduate students. In the study of the relevant field it is seen that undergraduate and graduate students do not have enough knowledge about academic ethical values and hear the concept of plagiarism for the first time. Students agree that copying and passing someone else's work on themselves during a test or exam is an unethical rule. The reasons that push students into unethical situations include ease of research, lack of skills in research methods, anxiety about grades, lack of time, and lack of complete knowledge of what research ethics is, which are the basis of these problems (Köklü, 2000; Thomas, Zly,2012 and Avaroğulları, Ata, 2013). Özden's and Ergin's (2013) study concluded that students behave in accordance with ethical rules. In the study of Yıldırım's and Orhan's (2018) study, it was concluded that students were not fully informed about the issue of academic integrity and felt a lack in this area. A study conducted on students of the Faculty of Education found that 95% of teacher candidates engaged in unethical behavior despite the fact that students were aware that academic irregularities were unethical and thought that this should be prevented (Özden and Özden, 2015).

Research in this area is not only limited to undergraduate and graduate students but also studies have been conducted on academics. Studies have shown that the reasons that drive faculty members to violations of ethical rules are that personal interests due to academic elevation get in the way of science academics consider it unethical to publish an article in multiple journals, to use scales without permission in their studies and not to give citations (Aydın, Şahin and Demirkasımoğlu, 2014; Özder, Işıқтаş, and Erdoğan, 2014). In the study of Kırkkılıç, Sevim, and Söylemez (2015), it was found that the scientific research attitudes of academicians were high. In the study of Erdirençelebi's and Filizöz's (2019) they tried to determine whether the perceptions and attitudes of academicians for ethical values differed according to their demographic variables and as a result they found that perceptions and attitudes varied according to demographic variables. It was concluded that plagiarism is the most unethical act in academic studies, and that competition and cooperation between colleagues contrary to research ethics are frequent (Oral, Avcı and Tösten, 2017).

The existence of academic misconduct in universities in America and the UK has been clearly seen in a number of important studies that are even widespread (De Lambert et al.,2006; McCabe,2005; Ashworth et al.,1997). For example, a Web study found significant cases of copying or cheating in written studies in the United States and Canada in surveys with 40,000 undergraduate

students (Ashworth, 1997). A study conducted among graduate students studying medicine found that students argued that it was okay to borrow text from different sources and make it into paragraphs (Ryan et al., 2009). In a study conducted in Turkey, it was determined that there were unfortunately serious ethical problems in the graduate theses written in our country. In the same study, high plagiarism rates of theses and a multi-number of research numbers that often repeat each other also emerged (Toprak,2017).

Today, the number of graduate students in Turkey and their studies are seeing a numerical growth due to the increasing number of universities. When we look at the number of theses entered by the National Thesis Center of the Higher Education Council, it is seen that 21.350 theses were written in 2009, 28.167 in 2014, and 72.846 in 2019 (YÖKTEZ statistics, 2020). This huge increase in numbers begs the question of what the content of theses is like. As a result of Şen's(2012) research on masters and doctoral studies in universities it was seen that theses contained many academic unethical behaviors.

Academic ethical rules are of great importance in ensuring confidence in scientists and scientific knowledge. In the scientific research process, honesty and openness should not be left behind from the beginning to the end of the study, and our thoughts on the studies carried out in the relevant field should be protective of the scientific rights of constructive and other scientists. If an irregularity is detected in the scientific research process, this causes a lack of trust in the researcher who conducted the study and the institution where the study was conducted. Of course, it is natural for such an event to have social consequences. It is inevitable that scientific research will lose its dignity and thus cause science and society to be adverse. The high rates of plagiarism that emerged in the study of Toprak (2017) and Şen(2012) revealing unethical behaviors in theses support this situation. It is thought that determining the attitudes of graduate students who will conduct scientific research in higher education institutions where future academics are trained will benefit the literature (TÜBA, 2002).

In this context, the aim of the study is to determine the attitudes of graduate students regarding academic ethical values. Since scientists are part of the social environment in which they live, it is important to investigate the demographic characteristics of graduate students, what education-level family they are raised in and whether they affect the attitudes of the institute in which they study towards academic ethical values. Sub-problems of the study;

- Do attitudes towards academic ethical values differ by gender?
- Do attitudes towards academic ethics differ depend on age?
- Do attitudes towards academic ethical values differ according to maternal education status?
- Do attitudes towards academic ethics differ according to paternal education status?
- Do attitudes towards academic ethics differ according to the institute?
- Do attitudes towards academic ethics differ according to the status of masters or doctorate?
- Is there a meaningful relationship between the attitude values of graduate students?

Methodology

Research Design

This research which aims to determine the attitudes of graduate students regarding academic ethical values is a quantitative study in the survey model. Survey research is a research model in which the status of a group is described as being changed as it is in order to learn the characteristics of a group. The reason why this method is preferred is that it offers the researcher the opportunity to generalization with data obtained from a large number of samples (Büyüköztürk, et al., 2018, p.15)

Study Group

The sample of the study consists of a total of 345 graduate students, including 272 masters and 73 Doctoral students studying at various universities in Turkey in the 2019/2020 academic year. In the research, the convenient sampling method was used as the sampling selection method. The advantage of this method is that it allows the researcher to easily collect data from a sample (Büyüköztürk, et al., 2018, p.95). The data of the research group is presented in Table 1.

Table 1. Information for Graduate Students

		N	Percent %
Gender	Female	221	64.1
	Male	124	35.9
Age	20-25 age	142	41.2
	26-29 age	102	29.6
	30 age and up	101	29.3
Maternal Education Status	Illiterate	29	8.4
	Primary school	147	42.6
	Secondary school	39	11.3
	High school	70	20.3
	University	60	17.4
Paternal Education Status	Illiterate	6	1.7
	Primary school	110	31.9
	Secondary school	45	13.0
	High school	85	24.6
	University	99	28.7
Institute	Educational Sciences	92	26.7
	Science	66	19.1
	Social Sciences	148	42.9
	Health Sciences	39	11.3
Active Learning Status	Master	272	78.8
	Phd	73	21.2

Data Collection Instruments

In the obtaining of the data of this study the "Personal Information Form" prepared by the researcher and the "Academic Ethical Values Scale" which was developed by Sevim (2014) and carried out the validity and trust studies were used. This scale consists of 50 items with a five-way Likert degree type from "Absolutely Disagree" to "Absolutely Agree". The scale has 5 dimensions: Values for scientific research, values for colleagues, values for the institution studied, values for society, and values for the teaching process. In the analysis of scores obtained from graduate students "I Completely Disagree" =1 point for positive substances on the scale. "I disagree"=2 points. "I'm undecided"=3 points. "I agree"=4 points and "Totally Agree"=5 points. For negative substances on the scale reverse scoring was done. Academic ethical values attitude score was obtained by dividing the total score received by graduate students from the scale by the number of items on the scale (50). Sevim (2014) stated that this scale had a Coefficient of Cronbach's Alpha trust of .86. He calculated Spearman-Brown as .84 and Guttman as .81. All internal consistency coefficients were found to be above .80. Cronbach's Alpha trust coefficient of the scale used to obtain the data was found to be .75 in this study. From here it is found that the measuring tool is reliable (Büyüköztürk. et al., 2018. p.115).

The arithmetic means evaluation interval was used to determine the attitudes of graduate students towards academic ethics. The coefficient range .80 points range is calculated as 12.4 (Başçı and Gündoğdu, 2011). The evaluation intervals of the averages for academic ethics are presented in Table 2.

Table 2. Evaluation Intervals of Averages for Academic Ethics

Coefficient Range	Score Range	Rating	Comment
1.00–1.80	106-118.4	I totally don't agree.	Low attitude
1.81–2.60	119-130.8	I don't agree	
2.61–3.40	131-143.4	I'm indecisive	Mediocre attitude
3.41–4.20	144-156.4	I agree	
4.21–5.00	157-168	I totally agree.	High attitude

Analysis

Mode, median, mean, standard deviation, distortion, and coefficient statistics were used to determine whether the data obtained from graduate students showed normal distribution. It was observed that the average score, mode, median values of graduate students from the scale were close to each other and the values of distortion and distortion were between -1 and +1. From this point of view, parametric tests were used in the analysis by concluding that the data was dispersed normally. "T-Test for Independent Groups" was applied to determine whether there is a significant difference between gender and active learning status variables and attitude scores of graduate students towards academic ethics. "One-Factor ANOVA" test was used to determine whether the difference between students' age, maternal education status, paternal education status, and attitude scores for institute variables and academic ethics was significant. In addition, a "Pearson Correlation Coefficient" test was applied to examine the relationship between variables and students with high attitude scores, moderate attitude scores, and low attitude scores. The "Cronbach Alpha Trust Coefficient" is calculated in determining the security of the data collection tool. The findings from the analysis of the data were interpreted at the level of .05 meaningfulness (Büyüköztürk, 2020. p.40).

Findings

The arithmetic means evaluation interval was used to determine the attitudes of graduate students towards academic ethics. The coefficient range .80 points range is calculated as 12.4 (Başçı and Gündoğdu, 2011). The average attitude score of graduate students towards academic ethics was 141.39. Considering Table 2 it is seen that graduate students have attitudes towards mediocre academic ethics.

In the analysis of sub-problems, “t-test for independent groups” was analyzed in gender and active learning status variables, and the results were presented in Table 4 by the results of the “one-factor ANOVA test” for age, maternal education status, paternal education status and institute variables in Table 5.

Table 4. T-Test Results for Independent Groups on Attitude Scores of Graduate Students towards Academic Ethics

		N	\bar{X}	S	t	df	P
Gender	Female	221	3.97	.28	3.56	343	.00
	Male	124	3.85	.31			
Active Learning Status	Master	272	3.91	.29	-1.69	343	.09
	Phd	73	3.98	.30			

p< .05

Table 5. One-factor ANOVA Results on Attitude Scores of Graduate Students Towards Academic Ethical Values

		N	\bar{X}	S	Source of Variance	KT	df	KO	F	p
Age	20-25 age	142	3.92	.27	Between groups	.04	2	.02	.26	.76
	26-29 age	102	3.91	.28	Within groups	30.99	342	.09		
	30 age and up	101	3.94	.34	Total	31.03	344			
Maternal Education Status	Illiterate	29	3.91	.33	Between groups	.39	4	.09	1.08	.39
	Primary school	147	3.89	.28	Within groups	30.64	340	.09		
	Secondary school	39	3.99	.30	Total	31.03	344			
	High school	70	3.93	.27						
	University	60	3.95	.33						
Paternal Education Status	Illiterate	6	4.11	.31	Between groups	.53	4	.13	1.49	.20
	Primary school	110	3.90	.27	Within groups	30.50	340	.09		
	Secondary school	45	3.90	.26	Total	31.03	344			
	High school	85	3.91	.30						
	University	99	3.97	.33						
Institutes	Educational	92	3.96	.33	Between groups	.24	3	.08	.91	.43
	Science	66	3.90	.25	Within groups	30.79	341	.09		
	Science	148	3.92	.29	Total	31.03	344			
	Social Sciences	39	3.87	.29						
	Health Sciences									

p< .05

Findings on Academic Ethical Values Attitude Scores for Gender Type Variable

T-test findings for independent groups applied to determine whether there is a significant difference between attitude scores for academic ethical values according to the gender variable of graduate students are presented in Table 6.

Table 6. T-Test Results for Independent Groups of Graduate Students' Attitude Scores on Academic Ethics by Gender Variable

Groups	N	\bar{X}	S	t	df	P
Female	221	3.97	.28	3.56	343	.00
Male	124	3.85	.31			

According to Table 6 221 of the graduate students who participated in the study were women and 124 were men. It is seen that the attitude score averages of female graduate students regarding academic ethics (\bar{X} =3.97) are higher than the attitude score averages (\bar{X} =3.85) related to the academic ethics of male graduate students. The p-value was found to be .00 in line with the analysis of the sub-problem "Are the attitudes of graduate students regarding academic ethical values differentiation according to gender?" Since $p \leq 0.05$ there is a significant difference between gender variable and academic ethical attitude.

Findings on Academic Ethical Values Attitude Scores for Age Variable

The findings of one-factor ANOVA which is applied to determine whether there is a significant difference between the attitude scores of graduate students towards academic ethical values according to age variable, are presented in Table 7 and Table 8.

Table 7. Measures of Central Tendency and Spread for Academic Ethical Values Attitude Scores for Age Variable

Groups	N	\bar{X}	S
20-25 age	142	3.92	.27
26-29 age	102	3.91	.28
30 age and up	101	3.94	.34
Total	345	3.92	.30

Table 8. One- Factor ANOVA Results of Academic Ethical Values Attitude Scores on Age Variable

Source of variance	Sum of squares	df	Mean of squares	F	P
Between groups	.04	2	.02	.26	.76
Within groups	30.99	342	.09		
Total	31.03	344			

$p < .05$

According to Table 7 and Table 8, the ages of graduate students participating in the study; It is seen that 142 people are between the ages of 20 and 25, 102 people are between the ages of 26 and 29 and 101 people are 30 years of age or older. In line with the analysis of the sub-problem "Do graduate students' attitudes regarding academic ethical values differ according to age?" the p-value was found to be .76. Since $p > 0.05$ there is no significant difference between the age variable and academic ethical attitude.

Findings on Academic Ethical Values Attitude Scores for Maternal Education Status Variable

The findings of the single-factor ANOVA, which is applied to determine whether there is a significant difference between the attitude scores of graduate students towards academic ethics according to the maternal education status variable, are presented in Table 9 and Table 10.

Table 9. Measures of Central Tendency and Spread for Academic Ethical Values Attitude Scores for Mother Education Status Variable

Group	N	X	S
Illiterate	29	3.91	.33
Primary school	147	3.89	.28
Secondary school	39	3.99	.30
High school	70	3.93	.27
University	60	3.95	.33
Total	345	3.92	.30

Table 10. One-Factor ANOVA Results of Academic Ethics Attitude Scores on Med Education Status Variable

Groups	Sum of squares	df	Mean of squares	F	p
Between groups	.39	4	.09	1.08	.36
Within groups	30.64	340	.09		
Total	31.03	344			

$p < .05$

According to Table 9 and Table 10, it is seen that 29 people are illiterate, 147 people are primary school graduates, 39 people are secondary school graduates, 70 people are high school graduates and 60 people are university graduates. "Do graduate students' attitudes about academic ethical values differ according to their maternal education educational status?" p-value according to the analysis of the sub-problem. It was found to be .36. Because it is $p > 0.05$ there is no significant difference between the maternal educational status variable and academic ethical attitude.

Findings On Academic Ethics Attitude Scores For Paternal Education Status Variable

The findings of a single-factor Anova, applied to determine whether there is a significant difference between the attitude scores of graduate students towards academic ethical values according to the paternal educational status variable, are presented in Table 11 and Table 12.

Table 11. Measures of Central Tendency and Spread for Academic Ethical Values Attitude Scores for Father Education Status Variable

Group	N	\bar{X}	S
Illiterate	6	4.11	.31
Primary school	110	3.90	.27
Secondary school	45	3.90	.26
High school	85	3.91	.30
University	99	3.97	.33
Total	345	3.92	.30

Table 12. Academic Ethics Related to Paternal Education Status Variable One-Factor ANOVA Results of Attitude Scores

Source of variance	Sum of squares	df	Mean of squares	F	p
Between groups	.53	4	.13	1.49	.20
Within groups	30.50	340	.09		
Total	31.03	344			

$p < .05$

According to table 11 and table 12 the father's educational status of the graduate students participating in the Study; 6 people are illiterate, 110 people are primary school graduates, 45 people are secondary school graduates, 85 people are high school graduates and 99 people are university graduates. "Do graduate students' attitudes about academic ethical values differ according to their paternal education status?" p-value according to the analysis of the sub-problem. It was found to be

20. Since it is $p > 0.05$, there is no significant difference between the father's educational status variable and academic ethical attitude.

Findings On Academic Ethics Attitude Scores For Institute Variable

The findings of a one-factor Anova, applied to determine whether there is a significant difference between the attitude scores of graduate students towards academic ethical values according to the Institute variable are presented in Table 13 and Table 14.

Table 13. Measures of Central Tendency and Spread for Academic Ethical Values Attitude Scores for Institute Variable

Group	N	\bar{X}	S
Institute of Educational Sciences	92	3.96	.33
Institute of Sciences	66	3.90	.25
Institute of Social Sciences	148	3.92	.29
Institute of Health Sciences	39	3.87	.29
Total	345	3.92	.30

Table 14. Academic Ethics Related to Institute Variable One-Factor ANOVA Results of Attitude Scores

Source of variance	Sum of squares	df	Mean of squares	F	p
Between groups	.24	3	.08	.91	.43
Within groups	30.79	341	.09		
Total	31.03	344			

$p < .05$

According to Table 13 and Table 12, 92 of the graduate students participating in the study at the institute of educational sciences, 66 at the institute of sciences, 148 at the institute of social sciences, and 39 at the institute of health sciences. "Do graduate students' attitudes about academic ethical values differ according to the Institute?" p-value according to the analysis of the sub-problem. It was found to be .43. Since it is $p > 0.05$ there is no significant difference between the Institute variable and academic ethical attitude.

Findings On Academic Ethics Attitude Scores For Active Learning Status Variable

The results of the T-test for independent groups applied to determine whether there is a significant difference between the attitude scores of graduate students towards academic ethical values according to the active learning status variable are presented in Table 15.

Table 15. T-Test Results for Independent Groups of Graduate Students Studying Attitude Scores Related to Academic Ethical Values According to the Active Learning Status Variable

Group	N	\bar{X}	S	T	df	p
Master	272	3.91	.29	-1.69	343	.09
Phd	73	3.98	.30			

$p < .05$

According to Table 15 272 of the 345 graduate students participating in the study were graduate students and 73 were doctoral students. "Do graduate students' attitudes about academic ethical values differ according to their masters or doctoral status?" p-value according to the analysis of the sub-problem. It was found as .09. Since it is $p > 0.05$ there is no significant difference between masters or doctoral degree status and academic ethical attitude.

Findings On The Relationship Between Attitude Scores Of Graduate Students

The Pearson correlation coefficient findings, applied to determine whether there is a meaningful relationship between the attitude scores of graduate students and the attitude scores for academic ethics are presented in Table 16.

Table 16. Pearson Correlation Coefficient Results Of Examining The Relationship Between Academic Ethical Values And Attitude Scores Of Graduate Students According To Variables

Variables	High Attitude Score	Mediocre Attitude Score	Low Attitude Score
Gender	-.02	-.10	-.01
Age	.18	.00	-.02
Maternal Education Status	.09	.12	.15
Paternal Education Status	.10	.02	-.28
Institutes	-.15	-.07	-.23
Active Learning Status	.03	.00	.18

According to Table 16 graduate students with a high degree of attitude score related to academic ethics have a negative relationship with gender and institute variables ($r = -.02$; $r = -.15$), age, maternal educational status, paternal educational status, and active educational status variables are positively associated with a weak ($r = .18$; $r = .09$; $r = .10$; $r = .03$). Graduate students with mediocre attitude points related to academic ethics have a weak negative relationship with gender and institute variables ($r = -.10$; $r = -.07$), in which there is a positively weak relationship with the variables of mother education status, father education status, and active learning status ($r = .12$; $r = .02$; $r = .00$) and the age variable. Graduate students with a low degree of attitude score related to academic ethics have a weak negative relationship with gender, age, father education status and institute variables ($r = -.01$; $r = -.02$; $r = -.28$; $r = -.23$) in which there is a positively weak relationship between the mother education status and active learning status variables ($r = .15$; $r = .18$).

Discussion, Conclusion and Suggestions

As academic research has gained momentum recently it is the basis of scientific research that researchers must adopt some universal ethical values in their work and act according to these principles. A good researcher should not deviate from ethical values in his work but should consider observing the rights of himself, society, colleagues as a way for him to obtain scientific knowledge. As a result of a study that is monitored in this way the development of science can be achieved (Çınar, Özer and Özkan, 2018). In this context the aim of the research is explained as determining the attitudes of graduate students towards academic ethical values. The findings were examined according to gender, age, maternal education status, paternal education status, educational institute, and active education status variables. This study differs from other studies in the field as a survey study using quantitative research methods. In the field of academic ethics, studies based on data obtained using qualitative research methods have usually been found when the literature is examined. According to the research conducted studies that use a quantitative research method are usually aimed at academics.

When the attitudes of graduate students about academic ethical values are investigated the findings obtained in the study are that graduate students have a mediocre attitude. Kırkkılıç's, Sevim's, and Söylemez's (2015) study, which examined the scientific research attitudes of academicians in terms of academic ethical values concluded that academicians' academic ethical attitudes in scientific research are high. In a study by Başaran, Ekinci, and Arıkan (2017) which investigated the level of behavior of teachers by ethical values it was found that teachers have a mediocre level of ethical perception towards other colleagues and towards students.

Research conducted in the world and Turkey found that graduate students generally do not exhibit behavior by ethical rules in their theses and other research (De Lambert et al., 2006; McCabe, 2005; Ashworth et al., 1997; Toprak, 2017). The result of the study of Üçüncü, Gökçe, Kıran, Izzetoğlu and Uzilday (2018) which aims to determine the perception of scientific ethics and honesty of graduate students of the department of biology is that graduate students are most aware of scientific unethical movements, forgeries and fabrications, and at least sliced publications. In his study Kurtulmuş and Ardıç (2013) observed unethical behaviors such as playing with data and unfair authorship by desk methods in analyzing the data of graduate students. Şahinoğlu and Bebek (2018) conducted a qualitative study on research assistants and found that research assistants have a basic level of knowledge about scientific ethics.

In a study that investigated the unethical behavior of students it was found that the reason for this situation is that students experience differences between what they learn in ethics courses and the situations they encounter in real life; problems arising from the system (academic promotion criteria, race) may be insufficient to act by ethical principles for many reasons. Another result from the same study is that ethical education is important for students but it will be more effective if a practical and continuous education model is considered than theoretical education (Gül et al., 2016). An experimental study of behavior conducted abroad found that subjects may exhibit unethical negative behavior even if they are individuals with a positive attitude due to compelling external factors (race, political reasons, compelling rules) (Fleischman and Valentine, 2019).

The attitude towards academic ethics graduate students are examined according to the gender variable in the determination of findings and female graduate students' academic ethical values and attitudes points and an average male graduate students' academic ethical values and attitudes it is observed that higher points on average. As a matter of fact, “do graduate students' attitudes about academic ethical values differ by gender?” sub-problems are applied in the analysis of independent sample t-test results according to gender and in favor of female students between the attitude towards academic ethics of graduate students showed a significant difference. Pehlivanlı and Akın(2019) that is the size of the subset of academic ethics in the study of “scientific values” and “values work for the institutions examined, there is a significant difference in favor of female academics that, “the process of teaching the values for” in the lower dimensions they have concluded that gender is not a significant difference according to the variable. In their study of the ethical values of academics Erdirencelebi and Filizöz (2019) found that the gender variable makes a significant difference in the lower dimensions of values for the colleague and values for the teaching process, and other lower dimensions do not make a significant difference. Orhan's and Günay's (2014) study investigated the reasons why students show internet-based academic irregularities and concluded that there was a significant difference in the effect of homework on the gender variable in favor of female students, taking into account the benefit it provides to the student. Üzüm and Sivrikaya(2018), Alkan (2015), Yılmaz and Ünsar (2019) have concluded that the gender variable has a significant impact on ethics. The results support the conclusion that the gender variable in this research has an impact on ethics. Özyer, Azizoğlu (2010) and Gençoğlu(2015) found that the gender variable did not have a significant impact on Ethics in their studies. Aydın, Demirkasimoğlu, and Alkın(2012) investigated academic ethics in Turkish universities and found that there was no significant difference compared to the gender variable.

According to the age variable findings, the average attitude score of graduate students aged 30 years and over is higher than the average attitude score of graduate students aged 20-25 years and the average attitude score of graduate students aged 20-25 years is higher than the average attitude score of graduate students aged 26-29 years. However, “do graduate students' attitudes about academic ethical values differ by age?” as a result of the one-factor ANOVA test conducted by the analysis of the sub-problem, it seems that this average difference between attitude scores for academic ethical values is not significant. Based on this it is concluded that the results obtained according to the age variable are similar. In their study of Erdirencelebi and Filizöz (2019) it was found that there was no significant difference between the values for scientific research which are the lower dimension of academic ethical values, and the age variable. This result is similar to the result of this study. However, it was determined that there was a significant difference between the age variable and the lower dimensions of the values for the colleague, the values for the institution studied, the values for the society, and the values for the teaching process. Pehlivanlı's and Akın's (2019) study found that academics between the ages of 41-50 had the highest attitude score. As a result of the analysis conducted to determine whether this result was significant, it was found that the lower dimension of the values for the institution studied made a significant difference. Alkan's(2015) ethical perceptions of accounting students s determined in the study, relationships within the institution for ethical perception, ethical perception of professional duties and responsibilities, and job-related individual perception towards ethical behavior in the dimension of the variable age had a significant effect but for the use of professional knowledge had a significant effect in the size of it is concluded that ethical perceptions.

According to the analysis of the data obtained for the maternal education status variable it is seen that the average maternal education status score varies from high to low in secondary school, University, High School, illiterate and primary school. At this point, "do graduate students' attitudes about academic ethical values differ according to their maternal educational status?" to conclude the sub-problem, one-factor ANOVA analysis was performed and as a result it was found that the difference in scores between the educational status groups was not significant. Üzüm and Sivrikaya (2018) concluded that the maternal educational status variable made a significant difference in their study, which was intended to determine the predisposition of students to ethical values. In his study Alkan (2015) concluded that the maternal educational status variable made a significant difference to students' ethical perceptions.

According to the paternal education status variable, the average score of paternal education status varies from high to low, illiterate, but in University, High School, Primary School, and secondary school. "do graduate students' attitudes about academic ethical values differ according to their paternal education status?" by the analysis of the sub-problem, one-factor ANOVA test was applied to the data and it was concluded that this average score difference was not significant. This result can be interpreted as the paternal educational status of graduate students being similar. Üzüm and Sivrikaya (2018) concluded that there is no significant difference between the predisposition of students to ethical values and the father's educational status variable. In his study Alkan(2015) determined that the paternal educational status variable made no significant difference to ethical perception. The results support the sub-hypothesis of this research.

According to the variable of the institute where graduate students study the average attitude to academic ethical values is ranked from high to low as the institute of educational sciences, the institute of social sciences, the institute of sciences, and the institute of health sciences. However, "do graduate students' attitudes about academic ethical values differ according to their paternal education status?" as a result of the one-factor ANOVA test conducted by its analysis it can be interpreted as the variable of the Institute studied does not have a significant effect on attitude scores towards academic ethical values. Based on this it can be said that the attitude scores of graduate students studying in different institutes towards academic ethical values are similar. In their study Erdirençelebi and Filizöz (2019) investigated the significant effect of the branch variable on academic ethics. As a result, it was found that the average score of values for scientific research, values for colleagues, values for the institution studied, and values for the teaching process, which are sub-dimensions of academic ethical values, did not have a significant impact on the branch of academics. But the values for society which are the lower dimension of academic ethical values, are another result that has a significant difference between the average score and the branch. This is similar to the conclusion that there is no significant difference between the Institute variable obtained in this study and the attitude towards academic ethical values.

According to the active learning status variable it is observed that the average score of doctoral students' attitude towards academic ethics is higher than the average score of graduate students' attitude towards academic ethics. "do graduate students' attitudes about academic ethical values differ according to their masters or doctoral status?" according to the analysis of the sub-problem an independent sample t-test was applied to the data and it can be interpreted that the active learning status does not make a significant difference in the attitude towards academic ethical values, and the attitudes of the groups are similar. Alkan(2015) investigated the ethical perceptions of accounting students and concluded that there was no significant difference between the ethical level and the class variable. The data obtained support the conclusion of this study.

Graduate students' attitude scores towards academic ethics are divided into three groups: Students with a high attitude score, students with a mediocre attitude score, and students with a low attitude score. "Is there a meaningful relationship between the attitude values of graduate students?" sub-problems according to the analysis of the findings as a result of a high degree of academic ethics attitude score related to gender and graduate students of the institute that there is a relationship between the variables weak negative directional, age, educational status of the mother, father, and active learning the educational status variable with the condition it was inferred that there is a weak relationship in a positive way.

According to the results obtained from graduate students with mediocre academic ethical values attitude score it was concluded that graduate students have a negative weak relationship with gender and institute variables a positive weak relationship with maternal education status, paternal education status, and active education status variables and that there is no relationship between age variable.

According to the results obtained from graduate students with low attitude scores related to academic ethical values, it was found that graduate students have a negative weak relationship with gender, age, paternal educational status, and institute variables and a positive weak relationship with maternal educational status and active educational status variables.

As a result of the research it was determined that graduate students who are considered future academics have a moderate attitude towards academic ethical values. Both the results of this research and other studies in the field should allow us to recognize our shortcomings in the field of academic ethics allowing us to improve behavior in this direction. In higher education institutions that train scientists students should be introduced early to the academic ethical principles that they will use at every stage of their lives and education should be given by spreading them over longer periods of time in practice. In this way students will have a chance to adopt academic ethical principles more. Higher education institutions should be added to the appointment and upgrade criteria of universities where the quality is more important than the number of publications in graduate education programs and in this way the universal ethical principles that should be used when conducting scientific research should be placed more in real life.

References

- Alkan, G. İ. (2015). Muhasebe Eğitiminde Etik: Ön Lisans Öğrencilerinin Etik Algılarına Yönelik Bir Araştırma. *Business and Economics Research Journal*, 6(2), 113-125.
- Ashworth, P., Bannister, P., Thorne, P. (1997). Guilty in whose eyes? University students' perceptions of cheating and plagiarism in academic work and assessment. *Studies in Higher Education*, 22(2), 187-203.
- Avaroğulları, M. ve Ata, B. (2013). Sosyal Bilgiler Öğretmeni Adayları ve İntihal: Önbilgileri, İntihalın Yaygınlığı ve Başvurulan Yöntemler. *Gaziosmanpaşa Bilimsel Araştırma Dergisi*, 4, 94-107.
- Aydın, İ., Demirkasimoğlu, N. ve Alkın, S. (2012). Academic ethics in Turkish universities: Perceptions of academicians from engineering, medicine and education colleges. *Eğitim Araştırmaları-Eurasian Journal of Educational Research*, 49, 41-60.
- Aydın, İ., Şahin, S. ve Demirkasimoğlu, N. (2014). Üniversitelerde karşılaşılan etik dışı davranışlara ilişkin akademisyen görüşleri. *Akademik bakış uluslararası hakemli sosyal bilimler dergisi*, (43) , 0-0.
- Başaran, S. T., Ekinci, N. ve Arıkan, S. (2017). Öğretim elemanlarının etik ilkelere uygun davranma düzeyi üzerine bir araştırma. *Yükseköğretim Dergisi*, 7(3), 197-208.
- Başçı, Z., ve Gündoğdu, K. (2011). Öğretmen adaylarının drama dersine ilişkin tutumları ve görüşleri: Atatürk Üniversitesi örneği. *Elementary Education Online*, 10(2), 454-467.
- Büyüköztürk, Ş., Çakmak, E., Akgün, Ö.E., Karadeniz, Ş. ve Demirel, F. (2018). *Eğitimde bilimsel araştırma yöntemleri*. (25). Ankara: Pegem akademi.
- Büyüköztürk, Ş. (2020). *Sosyal Bilimler İçin Veri Analizi El Kitabı*. (27. Baskı). Ankara: Pegem Akademi.
- Çınar, M. , Özer, A. ve Özkan, A. (2018, Mayıs). *Araştırma etiği ve bilimsel toplantılar*. Uluslararası etik araştırmaları sempozyumunda sunulmuştur. Gaziantep.
- De Lambert, K., Ellen, N., Taylor, L. (2006). Chalkface challenges: a study of academic dishonesty amongst students in New Zealand tertiary institutions. *Assess Eval Higher Education*, 31(5), 485-503.
- Erdem, A. R. (2012). Bilim insanı yetiştirmede etik eğitimi. *Yükseköğretim ve Bilim Dergisi*, 2(1), 25-32.
- Erdirencelebi, M. ve Filizöz, B. (2019). Meslek Etiği ve Akademisyenlerin Etik Değerleri Üzerine Nicel Bir Araştırma. *Uluslararası toplum araştırmaları dergisi*, 14(20), 1228-1258.
- Ertekin, C.,Berker, N., Tolun, A., Ülkü, D., Aksan, D., Erzan, A., vd., (2002). *Bilimsel Araştırmada Etik ve Sorunları*.(2). Ankara: Türk Bilimler Akademisi Yayınları.
- Fleischman, G.M., Valentine, S.R. (2019). How Outcome Information Affects Ethical Attitudes and Intentions to Behave. *Behavioral Research in Accounting*, 31(2), 1-15.

- Gençoğlu, M. (2015). *Öğretim elemanlarının akademik etik kapsamındaki davranışlarına ilişkin öğretmen adaylarının görüşleri*. (Yüksek lisans tezi). Girne Amerikan üniversitesi sosyal bilimler enstitüsü eğitim yönetimi ve denetimi yüksek lisans programı, Girne.
- Gül,Ş., Kuzuca, G.İ., Yalım, Y.N. (2016). Hemşirelerin etik eğitiminin meslek hayatına yansımaları konusundaki görüşleri. *TJOB*, 3(2), 85-97.
- Kırkkılıç, H.A., Sevim, O. ve Söylemez, Y. (2015). Akademisyenlerin bilimsel araştırma tutumlarının akademik etik değerler açısından incelenmesi. *Erzincan Üniversitesi Sosyal Bilimler Enstitüsü Dergisi*, 9(2), 375-390.
- Köklü, D. (2000). Lisans ve Lisans Üstü Öğrencilerinin Görüşlerine Göre Araştırma Sürecine Yönelik Etik Olmayan Davranışları Gösterilme Sıklığı ve Nedenleri. *Kuram ve Uygulamada Eğitim Yönetimi*, 24(24), 527-542.
- Kuçuradi, İ.(2003). Etik ve etikler. *Türkiye Mühendislik Haberleri*, 423, 7-9.
- Kurtulmuş, M., Ardiç, T. (2013). Lisansüstü öğrencilerin bilimsel araştırma sürecine ilişkin gözlemledikleri etik dışı davranışlar. *International Periodical For The Languages, Literature and History of Turkish or Turkic* , 12(8), 831-840.
- McCabe, D. (2005). It takes a village: academic dishonesty and educational opportunity. *Liberal Education*, 91(3), 26-31.
- Oral, B., Avcı, Y.E ve Tösten, R. (2017). Öğretim elemanlarının mesleki hayatlarında karşılaştıkları etik olmayan davranışlar: dicle üniversitesi örneği. *Elektronik Sosyal Bilimler Dergisi*, 16(63), 1230-1241.
- Orhan, F ve Günay, A. (2014). Üniversite öğrencilerinin internet tabanlı akademik usulsüzlük nedenlerinin çeşitli değişkenlere göre incelenmesi. *Ege Eğitim Dergisi* , 15 (1), 176-190.
- Özden, M. ve Ergin, B. (2013). Lisansüstü öğrencilerinin bilimsel araştırmalarda uygulanan etik kurallara yönelik düşüncelerinin belirlenmesi. *Mustafa Kemal Üniversitesi Sosyal Bilimler Enstitüsü Dergisi*, 10(22), 155-169.
- Özden. M.. Özden. D.Ö.. (2015). Akademik usulsüzlük: öğretmen adaylarının görüşleri ve deneyimleri. *Mersin Üniversitesi Eğitim Fakültesi Dergisi*, 11(2), 505-525.
- Özder, H., Işıktaş, S. ve Erdoğan F. (2014). Öğretim elemanlarının akademik etik kurallardan haberdar olma ve onaylama dereceleri. *International Journal of New Trends in Arts, Sports & Science Education* , 3(1), 22-37.
- Özyer, K. ve Azizoğlu, Ö. (2010). Demografik değişkenlerin kişilerin etik tutumları üzerindeki etkileri. *Ekonomik ve Sosyal Araştırmalar Dergisi*, 6(2), 59-84.
- Pehlivanlı, A. E. Ve Akın, A. (2019). Demografik değişkenlere göre akademik etik değerler ve işkoliklik düzeylerinin incelenmesi: ampirik bir çalışma. *Uluslararası Sosyal Araştırmalar Dergisi*, 12(65), 1209-1226.
- Ryan, G., Bonanno, H., Krass, I., Scouller, K., & Smith, L. (2009). Undergraduate and postgraduate pharmacy students' perceptions of plagiarism and academic honesty. *American journal of pharmaceutical education*, 73(6), 105.
- Sevim, O. (2014). Akademik etik değerler ölçeğinin geliştirilmesi: Güvenirlik ve geçerlilik çalışması. *Turkish Studies - International Periodical For The Languages, Literature and History of Turkish or Turkic*, 9(6), 943-957.
- Sönmez, V. ve Alacapınar, F.G. (2011). *Örneklendirilmiş Bilimsel Araştırma Yöntemleri*.(1). Ankara: Anı Yayıncılık.
- Şahinoğlu, A , Bebek, G . (2018). Araştırma görevlilerinin bilimsel araştırma etiğine ilişkin algıları: nitel bir çalışma. *Adnan menderes üniversitesi eğitim fakültesi eğitim bilimleri dergisi*, 9(1) , 47-58.
- Şen, Z. (2012). Türkiye üniversitelerinde yüksek Lisans ve doktora çalışmalarının nitelik eleştirisi ve iyileştirme önerileri. *Yükseköğretim Dergisi*, 3(1), 1-8.
- Şimşek, H. ve Yıldırım, A. (2016). *Sosyal Bilimlerde Nitel Araştırma Yöntemleri*. (11). Ankara: Seçkin Yayınları.
- Thomas, A. ve Zly, A. V. (2012). Understanding of and attitudes to academic ethics among first-year university students. *African Journal of Business Ethics*, 6(2), 143-156.
- Toprak, Z . (2017). Türkiye’de Akademik Yazı: İntihal ve Özgünlük. *Boğaziçi Üniversitesi Eğitim Dergisi*, 34(2), 1-12.
- Üçüncü, S.İ., Gökçe, B., Kıran, M., İzzetoğlu, S., Uzılday, B., (2018). Biyoloji bölümü lisansüstü öğrencilerinde bilimsel etik ve dürüstlük algısı. *Turkish Studies (Elektronik)*, 13(19), 1039-1060.

- Üzüm, B, Sivrikaya, S.Ö. (2018). Meslek yüksekokulu öğrencilerinin etik değerlere yakınlık düzeyleri (kocaeli myo örneği). *Uluslararası Bilimsel Araştırmalar Dergisi (IBAD)*, 3(1), 230-240.
- Yıldırım, B.F. ve Orhan, E.E. (2018). Yükseköğretimde akademik dürüstlüğü ilişkin öğrenci görüşleri, deneyimleri ve önerileri: bir olgu bilim araştırması. *Yükseköğretim ve Bilim Dergisi*, 8(1), 202-210.
- Yılmaz, F. ve Ünsar, A. (2019). Öğretim elemanlarının etik değerlerinin belirlenmesine yönelik öğrenci algısı. *Adıyaman Üniversitesi Sosyal Bilimler Enstitüsü Dergisi*, (33), 105-124.
- Yöktez.(2020). İstatistikler. 6 Haziran 2020 tarihinde <https://tez.yok.gov.tr/UlusalTezMerkezi/IstatiskiBilgiler?=2> adresinden erişilmiştir.