

Investigation of the correlation of academic motivation and music performance anxiety levels

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Abstract

This research was carried out to measure the academic motivation levels of pre-service music teachers as well as the music performance anxiety levels to investigate potential correlations between them. The sample group of this scanning modelled study is comprised of 241 students studying at departments of music education at Niğde Ömer Halis Demir University, Pamukkale University, Konya Necmettin Erbakan University and Karadeniz Technical University. To determine the demographic features of the students taking part in the study, a demographic information form was used. In order to measure students' music performance anxiety and academic motivation levels, the data collected using the Music Performance Anxiety Scale and Academic Motivation Scale. The data was analyzed using percentage and frequency distributions. The Pearson Product Moments' Correlation technique, which is commonly used to calculate the correlation between the variables, was used. As the result of the findings obtained from the study, a significant positive correlation was found between music performance anxiety and academic motivation levels of the students. The anxiety and academic motivation levels of pre-service teachers were found to be moderate.

Keywords: Music education; music teacher, music performance anxiety, academic motivation.

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1. Introduction

1.1. Academic motivation

Motivation, originated from the Latin word ‘movere’, means ‘Mental state that leads someone to a desired goal’ (Turkish Language Association, 2011). In other words, motivation is the force that constitutes the basis for an individual to move towards the targeted behavior for a specific purpose, pushes the person into action and ensures that the person continues to do so (Kumcağız, 2016). These are some of the general definitions of motivation. However, if we are to talk about the driving force that leads an individual to take action to achieve an academic goal; then it is called ‘academic motivation’ (as cited in Gömleksiz ve Serhatlıoğlu, 2013, p.103).

Anxiety as a term has various meanings and manifestations. Semantic difficulties extend the various meanings that are attached to similar terms in different languages. Anxiety may be defined as a psychophysiological phenomenon experienced as a foreboding dread or threat to a human organism whether the threat is generated by internal, real or imagined dangers (Emilien et al., 2002, p.1). Anxiety disorders occur as a pathological condition, involving unwanted reactions (behavioral and neurovegetative) that are either extreme or occur to inappropriate eliciting stimuli or situations (Offermanns & Resenthal, 2004, p.167). The basic characteristics of Generalized anxiety disorder (GAD) are worry and anxiety about a range of events and situations and the symptoms occur on the majority of days for at least six months. A person may experience symptoms such as restlessness, muscle tension, irritability, fatigue and difficulties in concentration or sleep (Beesdo-Baum & Hilbert, 2015, p.1).

In education, the notion of “motivation” is closely related to ‘academic motivation’. Lack of motivation during the education process is something that affects and restrains student (Grunschel, et al., 2016). Deci and Ryan (1985) mention that academic motivation is closely related to students’ curiosity and performance during the learning process. This type of motivation emerges at the beginning of the student’s education life and it gives them the driving force for their field-related work (Bacanlı & Şahinkaya, 2011, p.563).

Sources and reasons of academic motivation differ from theory to another. Several theories were suggested in order that the notion of academic motivation is understood better (Bozanoğlu, 2004, p.84). For instance; expectancy-value theory, target theory, self-efficacy theory. When we talk about academic motivation, alongside with the theories above, self-determination theory is the most prominent theory (Clark, et al., 2014, p.30). Deci and Ryan (2000) define self-determination as “making choices and experiencing those choices”. The individual who determines his/her own priorities, determines his/her goals in line with those priorities and motivates himself/herself in accordance with these objectives and sets the necessary goals (as cited in: Yurt & Bozer, 2015). Academic motivation scales which are generally employed in order to measure the academic motivation are based on the self-determination theory (Karagüven, 2012; Yurt & Bozer, 2015; Kara, 2008; Karataş & Erden, 2012).

1.2. Performance anxiety: Almost anyone can experience some form of anxiety to a degree

Anxiety can be observed frequently in daily life. Almost anyone can experience some forms of anxiety to a degree. It is the forefront of many psychological teachings. While some people state that anxiety is the most basic condition that forms an individual’s personality, some people express that it is secondary but very effective (Köknel, 1985, p.165). Anxiety is defined as “sadness, being concerned about something, worry, uneasiness that social clusters and individuals feel about the possibility that

any strong desire or motive they have will not occur.” (Turkish Language Association, 2009, p. 1115) An individual’s reaction towards situations may vary depending on their level of anxiety. Moreover, though what anxiety feels like can be known; its exact reasons can’t be identified (Karagüven, 1999, p.204). However, it is also known that anxiety is a condition that causes uneasiness and it affects the individual’s behavior: in some situations, anxiety leads a person to behave in a constructive and creative way and sometimes it may cause destructive behavior (Başarı, 1990, p.1). There is a close relation between the efficiency of learning and anxiety; and anxiety affects a person’s school life as well as his/her daily life (as cited in Bahadır, 2016, p. 14). Long-lasting and severe anxiety causes a decrease in an individual’s learning efficiency. In cases where anxiety’s level is lower, learning efficiency is higher. When it is light and powerful, learning efficiency gets lower (Cüceloğlu, 2017, p.441).

Anxiety which is derived from the thought of not being liked can be seen from very early ages (Gidergi-Alptekin, 2012, p.138). Performance anxiety which is seen in a wide range of people, from students to professionals, is more prominent in some fields. Fields like art education, physical education etc. can be given as examples (Ekinci, 2013, p.53; Kee, 1993, p.87; Gidergi-Alptekin, 2012, p.138). Music education is also one of these areas. Music performance anxiety occurs when an individual feels worried about delivering a poor performance in front of the audience (Valentine, 2003, p.168).

Various studies revealed that pre-service music teachers have music performance anxiety (i.e.: Baydağ and & Alpagut, 2016; Özevin Tokinan, 2014; Güdek & Çiçek, 2017). It is almost impossible for people who are engaged in music, especially professionally, to avoid performance; so, it is impossible for them to avoid having music performance anxiety. However, some studies also suggest that music performance anxiety may affect the performance positively. Çimen (2001) stated that some people who are involved in music can deal with anxiety and use it to turn the situation into a positive incident on stage. Steptoe (2001) argued that a physiological stimulation is necessary for successful performance and said that one of these physiological stimuli is anxiety. In other words, as it can be understood, some researchers think performance anxiety is beneficial while others think it is the opposite.

Despite the many researches on music performance anxiety, the reasons and effects of the music performance anxiety are yet to be identified with certainly (Mensberger, 1988). ‘The reasons of music performance anxiety involve mental processes such as previous performance experiences, perfectionism, physiological, cognitive and psychological factors.’ (as cited in Çirakoğlu, 2013, p.97). It is thought that social pressure may be one of the reasons of the performance anxiety (Lee, 2002, p.36).

1.3. Problem

Music teacher training institutions, which are one of the vocational music training institutions, accept their students based on a special talent exam and these exams involve a performance process. This performance process is a part of not only the exam but also the whole education period and exists as long as the individual proceeds his/her professional life; because for a music trainer, performance is always a part of life. Giving lectures, playing a song with an instrument as an example, singing along with his/her students can be given as instances of a teacher’s performances.

Pre-service music teachers and music teachers may face some problems during these performance processes. While the reasons can be physiological, they can also be psychological. Anxiety is thought to be one of the psychological reasons. Some studies reveal that the pre-service music teachers have performance anxiety (I.e.: Baydağ & Alpogut, 2016; Özevin Tokinan, 2014; Güdek & Çiçek, 2017). It is thought that lack of motivation may be one of the reasons of music performance anxiety. Corresponding with this subject, Martin (2007) states that motivation is an important strength in order for a student to show his/her real potential during the performance process, while Baydağ & Alpogut (2016) say that motivation is an inseparable part of a performance. Habgood and Ainsworth (2011) stated that each student may have a different level of anxiety but motivation can affect the anxiety during performance positively. Based on the researchers' comments, it is believed that there's a connection between motivation and music performance anxiety. Supporting this statement, Karagüven (2012) says that academic motivation is an important element for the student to participate in the activities taking place in the setting. It is thought that while academic motivation affects the conditions about the performance, music performance anxiety affects the academic motivation. Although departments of music education are institutions that aim to raise music teachers, each student faces events and situations that require them to perform. As Baydağ and Alpogut (2016) stated "No matter how devoted a person is to working in the field, extreme performance anxiety may end the career of a student with a bright future." In other words, it is thought that even though pre-service teachers are motivated to work as teachers in their field, extreme music performance anxiety may cause them to think that they won't be able to be successful and may cause their careers to end.

Based on this information, it is believed that there is a relationship between academic motivation of the pre-service teachers and music performance anxiety. It is predicted that academic motivation and music performance anxiety can mutually affect each other. This research aims to investigate and determine the music performance anxiety levels and academic motivation levels of pre-service music teachers and to reveal the relationship between music performance anxiety and academic motivation.

2. Method

2.1. Research model

This research based on a correlational survey model research. Karasar (2014) explains that the main feature of the survey research model is to reveal the existing situation as it exists. He also states that the relational survey model's main feature is to reveal the change relations of multiple variables that exist in research. A correlational research design is the measurement of two or more factors to determine or estimate the extent to which the values for the factors are related or change in an identifiable pattern (Privitera, 2013, p.240). In an analysis within a correlational study, two or more sets of data are collected from a group in an attempt to determine the relationship between the subjects. (Tuckman & Harper, 2012, p.134).

In this study, the levels of academic motivation and music performance anxiety of pre-service music teachers are identified and the relationship is revealed based on some demographic characteristics. Moreover, the relationship between music performance anxiety levels and academic motivation levels will be examined.

2.2. Population and sample

This study's population involves pre-service music teachers at music education departments in Turkey. The sample group consists of 241 students who are selected from music teacher training institutions in Turkey with convenience sampling.

In this study, pre-service music teachers' levels of music performance anxiety and academic motivation are identified and their relationship with some demographic characteristics is revealed. Moreover, the relationship between music performance anxiety levels and academic motivation levels will be examined.

Table 1. Frequency and Percentage Distribution of Students in the Sample Group According to Their Current Universities

Name of the University	<i>f</i>	%
Karadeniz Technical University	74	30.7
Konya Necmettin Erbakan University	74	30.7
Niğde Ömer Halis Demir University	49	20.3
Pamukkale University	44	18.3
<i>Total</i>	241	100.0

According to Table 1, if we are to rank total of 241 students in accordance with their frequency density, 30.7% of them are from (74 students) Karadeniz Technical University, 30.7% of them are from (74 students) Konya Necmettin Erbakan University, 20.3% of them are from (49 students) Niğde Ömer Halis Demir University and 18.3% of them are from (44 students) Pamukkale University.

2.3. Data collection tools

In this study, a demographic information form and two separate scales will be used to collect data. The first scale was designed to measure students' academic motivation. Academic Motivation Scale was developed by Vallerand et al. (1992). The scale has English (1992) and French (1989) forms. The scale and was developed adopted to Turkish by Karagüven (2012). The second scale was designed to measure students' music performance anxiety and it was developed by Kenny (2004) and adopted to Turkish by Özevin-Tokinan (2013).

The Academic Motivation Scale (AMS), which is based on the self-determination theory, is a 7-point likert scale adapted to Turkish by Karagüven (2012). There exists seven factors in the scale and each of the factors includes four articles. It's made up of 28 articles. These factors are Intrinsic Motivation to Know, Intrinsic Motivation toward Accomplishments, Intrinsic Motivation to Experience Stimulation, Extrinsic Motivation-Identification, Extrinsic Motivation- Introjected Regulation, Extrinsic Motivation-External Regulation and Amotivation. The rating options are as following: "it doesn't correspond at all, it slightly corresponds, it moderately corresponds, it quite corresponds and it exactly corresponds". The lowest sub-test score is 4 and the highest sub-test score is 28. The study group consists of 390 senior students from Marmara University. At the beginning of the study, a preliminary study was performed and the original scale was applied to 88 senior students of English department and the Cronbach alpha value of 0.87 was obtained. Approximately two weeks later, forms in Turkish were handed to the same group and it was observed that correlation was varying between 0.29 and 0.68, it showed similarity. For the theoretical and conceptual validity of the scores obtained, the relationships with the other scales were examined and expert opinion was obtained on the content validity. For criterion-dependent validity, exam anxiety inventory and environmental support scale were used. While total article correlation coefficient of the scale ranged from 0.22 to 0.64, the Cronbach Alpha reliability coefficient for the scale was determined as 0.87. Cronbach's Alpha values for sub-

dimensions were calculated as 0.79 on Intrinsic Motivation to Know dimension, 0.74 on Intrinsic Motivation toward Accomplishments dimension, 0.67 on Intrinsic Motivation to Experience Stimulation dimension, 0.79 on External Motivation-Identification dimension, 0.75 on External Motivation-Introjected Regulation dimension, 0.73 on Extrinsic Motivation- External Regulation dimension and 0.83 on Amotivation dimension. Standard error of measuring is varying between 0.40-2.93. To interpret the arithmetic means; average values between 1.00-7.00 were determined as “Does not correspond at all: 1.-1.85”, “Slightly corresponds: 1.86-3.55”, “Moderately corresponds: 3.56-4.40”, “Highly corresponds: 4.41-6.10” and “Exactly corresponds: 6.11-7.00”.

6-point Likert scale, which was formed by the adaptation of Kenny Music Performance Anxiety inventory (2004) to Turkish by Özevin Tokinan (2013), consists of 25 articles and 5 factors. These factors are determined as “Negative Performance Perception, Psychological Defencelessness, Somatic Anxiety, Personal Monitoring and Physiological Defencelessness”. The Cronbach Alfa reliability coefficient of the valid and reliable scale is 0.895 and it was revealed that total article correlations of the articles vary between 0.336 and 0.615. The study group of this scale consists of 715 students from Departments of Music Education of various universities in Turkey. During the adaptation process of the scale into Turkish a group of three people, which consists of a professional translator, an academic of the department of English Language and Literature and an expert in music, worked together on the translation of the articles. During the statistical procedures, 14 articles whose article correlation coefficients were below 0.30 were excluded from the scale.

2.4. Data Collection

In order to apply the required scale of the study to the selected universities with convenience sampling, necessary permissions were obtained from the related universities via the institutes. The application was carried out face-to-face in the universities that could be reached; if not, the academic who was going to apply the application was informed about the scale. Special attention was paid to the constitution of an appropriate environment and it was made sure that the scale, which was sent by cargo, was applied. Data collection process lasted two months. After data was collected, data entries were made and data was made ready for analysis.

2.5. Data analysis

In this part, the data was gathered from the participants who are pre-service music teachers via “Music Performance Anxiety Scale” and “Academic Motivation Scale”. The data collected was analysed using SPSS (Statistics Package for Social Sciences).

Percentage and frequency distributions that determine the demographic features of pre-service teachers were created. In order to determine the music performance anxiety levels and academic motivation levels of the pre-service music teachers the average (\bar{x}) and standard deviation (sd) values of the scores related to the scales and sub-dimensions were calculated. In order to determine the relationships between pre-service music teachers’ levels of music performance anxiety, their levels of academic motivation and sub-dimensions, Pearson Product-moment Correlation was used.

3. Findings

Table 2. Frequency and Percentage Distribution of Students’ Genders in the Sample Group

Gender	<i>f</i>	%
Female	154	63.9
Male	87	36.1
<i>Total</i>	241	100.0

63.9% (154 students) of 241 students in the sample group are females while 36.1% (87 students) of them are males. Based on these facts, it can be seen that the majority of the sample group is females.

Table 3. Descriptive Values of Music Performance Anxiety and Sub-Scale Levels of the Students in the Sample Group

Scale	<i>n</i>	<i>Min.</i>	<i>Max.</i>	\bar{x}	<i>SD</i>
Music Performance Anxiety (Total)	241	26.00	148.00	85.01	27.99
1. Negative Performance Perception	241	14.00	84.00	47.72	17.64
2. Psychological Defenselessness	241	8.00	48.00	25.81	8.33
3. Somatic Anxiety	241	1.00	6.00	4.09	1.52
4. Personal Monitoring	241	1.00	6.00	3.89	1.64
5. Physiological Defenselessness	241	1.00	6.00	3.51	1.69

The overall average of Music Performance Anxiety scale of pre-service music teachers in the sample group is 85.01. It's seen that the lowest evaluation value of the group's music performance anxiety is 26 and the highest is 148. With 7-graded answers, (0, 1, 2, 3, 4, 5, 6 and 7) for an exam in which the maximum grade is 150 and the minimum is 0, the value of 85.01 corresponds to 56.67 out of a hundred. It can be said that this value is on medium level for the average. In the scale, below 45 shows low level of anxiety while above 105 show high level of anxiety.

Table 4. Descriptive Values of Academic Motivation and Sub-Scale Levels of Students in the Sample Group

Scale	<i>n</i>	<i>Min.</i>	<i>Max.</i>	\bar{x}	<i>SD</i>
Academic Motivation (Total)	241	45.00	183.00	129.77	24.88
1. Intrinsic Motivation to Know	241	5.00	28.00	22.07	4.95
2. Intrinsic Motivation toward Accomplishments	241	4.00	28.00	18.92	5.42
3. Intrinsic Motivation to Experience Stimulation	241	4.00	28.00	18.29	5.52
4. External Motivation-Identification	241	4.00	28.00	22.57	5.08
5. Extrinsic Motivation-Introjected Regulation	241	4.00	28.00	17.41	5.57
6. Extrinsic Motivation-External Regulation	241	4.00	28.00	20.35	4.87
7. Amotivation	241	4.00	28.00	10.16	6.48

The overall average of "Academic Motivation Scale" of pre-service music teacher in the sample group is 129.77. It is seen that the lowest evaluation value is 45 and the highest is 183. With 7-graded answers (1, 2, 3, 4, 5, 6 and 7) for an exam in which the maximum grade is 196 and the minimum is 28, the value of 129 corresponds to 60.12 out of a hundred. It can be said that this average is on medium level.

Table 5. Pearson Product Moments' Correlation Results Related to the Relationships between Academic Motivation and Music Performance Anxiety Scores

Scales	<i>n</i>	<i>r</i>	<i>p</i>
Academic Motivation & Music Performance Anxiety	241	0.21	<i>p</i> <0.01

A meaningful and positive correlation was found between Academic Motivation scores and Music Performance Anxiety scores ($r=0.21$, $p<0.01$). Since this correlation is between 0.2-0.4, it can be defined as a weak relation.

Table 6. Pearson Product Moment Correlation Results Carried Out Between Academic Motivation Subscale Scores and Music Performance Anxiety Subscale Scores

		Music Performance Anxiety						
		NPP	PD	SA	PM	PDf	TPA	
Academic Motivation	IMtK	<i>r</i>	0.02	0.01	0.19	0.13	0.13	0.04
		<i>p</i>	--	--	$p<0.01$	$p<0.05$	$p<0.05$	--
	IMtA	<i>r</i>	0.09	0.06	0.11	0.16	0.14	0.10
		<i>p</i>	--	--	--	$p<0.05$	$p<0.05$	--
	IMtES	<i>r</i>	0.07	0.04	0.10	0.10	0.11	0.07
		<i>p</i>	--	--	--	--	--	--
	EM-I	<i>r</i>	0.03	-0.01	0.17	0.07	0.13	0.04
		<i>p</i>	--	--	$p<0.05$	--	--	--
	EM-IR	<i>r</i>	0.26	0.23	0.17	0.18	0.19	0.26
		<i>p</i>	$p<0.001$	$p<0.001$	$p<0.01$	$p<0.01$	$p<0.01$	$p<0.001$
EM-ER	<i>r</i>	0.16	0.14	0.22	0.12	0.16	0.17	
	<i>p</i>	$p<0.05$	$p<0.05$	$p<0.01$	--	$p<0.05$	$p<0.01$	
A	<i>r</i>	0.18	0.41	0.06	0.06	0.05	0.25	
	<i>p</i>	$p<0.01$	$p<0.001$	--	--	--	$p<0.001$	
TAM	<i>r</i>	0.18	0.20	0.22	0.18	0.19	0.21	
	<i>p</i>	$p<0.01$	$p<0.01$	$p<0.01$	$p<0.01$	$p<0.01$	$p<0.01$	

NPP: Negative Performance Perception, PD: Psychological Defenselessness, SA: Somatic Anxiety, PM: Personal Monitoring, PDf: Physiological Defenselessness, TPA: Total Performance Anxiety

IMtK: Intrinsic Motivation to Know, IMtA: Intrinsic Motivation toward Accomplishments, IMtES: Intrinsic Motivation to Experience Stimulation, EM-I: External Motivation-Identification, EM-IR: Extrinsic Motivation-Introjected Regulation, EM-ER: Extrinsic Motivation- External Regulation, A: Amotivation, TAM: Total Academic Motivation

As a result of the correlation carried out between Academic Motivation Subscale Scores and Music Performance Anxiety Subscale Scores;

A meaningful and positive correlation was found between Intrinsic Motivation to Know and Somatic Anxiety sub-scale scores ($r=0.19$, $p<0.01$).

A meaningful and positive correlation was found between Intrinsic Motivation to Know and Personal Monitoring sub-scale scores ($r=0.13$, $p<0.05$).

A meaningful and positive correlation was found between Intrinsic Motivation to Know and Physiological Defenselessness sub-scale scores ($r=0.13$, $p<0.05$).

A meaningful and positive correlation was found between Intrinsic Motivation toward Accomplishments and Personal Monitoring sub-scale scores ($r=0.16$, $p<0.05$).

A meaningful and positive correlation was found between Intrinsic Motivation toward Accomplishments and Physiological Defenselessness sub-scale scores ($r=0.14$, $p<0.05$).

A meaningful and positive correlation was found between External Motivation-Identification and Somatic Anxiety sub-scale scores ($r=0.14$, $p<0.05$).

A meaningful and positive correlation was found between Extrinsic Motivation-Introjected Regulation and Negative Performance Perception sub-scale scores ($r=0.13$, $p<0.05$).

A meaningful and positive correlation was found between Extrinsic Motivation-Introjected Regulation and Psychological Defenselessness sub-scale scores ($r=0.23$, $p<0.001$).

A meaningful and positive correlation was found between Extrinsic Motivation-Introjected Regulation and Somatic Anxiety sub-scale scores ($r=0.17$, $p<0.01$).

A meaningful and positive correlation was found between Extrinsic Motivation-Introjected Regulation and Personal Monitoring sub-scale scores ($r=0.18$, $p<0.01$).

A meaningful and positive correlation was found between Extrinsic Motivation-Introjected Regulation and Physiological Defenselessness sub-scale scores ($r=0.19$, $p<0.01$).

A meaningful and positive correlation was found between Extrinsic Motivation-Introjected Regulation sub-scale score and Total Performance Anxiety scores ($r=0.26$, $p<0.001$).

A meaningful and positive correlation was found between Extrinsic Motivation- External Regulation and Negative Performance Perception sub-scale scores ($r=0.16$, $p<0.05$).

A meaningful and positive correlation was found between Extrinsic Motivation- External Regulation and Psychological Defenselessness sub-scale scores ($r=0.14$, $p<0.05$).

A meaningful and positive correlation was found between Extrinsic Motivation- External Regulation and Somatic Anxiety sub-scale scores ($r=0.22$, $p<0.01$).

A meaningful and positive correlation was found between Extrinsic Motivation- External Regulation and Physiological Defenselessness sub-scale scores ($r=0.16$, $p<0.05$).

A meaningful and positive correlation was found between Extrinsic Motivation- External Regulation sub-scale score and Total Performance Anxiety scores ($r=0.17$, $p<0.01$).

A meaningful and positive correlation was found between Amotivation and Negative Performance Perception sub-scale scores ($r=0.18$, $p<0.01$).

A meaningful and positive correlation was found between Amotivation and Psychological Defenselessness sub-scale scores ($r=0.41$, $p<0.001$).

A meaningful and positive correlation was found between Amotivation sub-scale score and Total Performance Anxiety scores ($r=0.25$, $p<0.001$).

A meaningful and positive correlation was found between Total Academic Motivation score and Negative Performance Perception sub-scale scores ($r=0.18$, $p<0.01$).

A meaningful and positive correlation was found between Total Academic Motivation score and Psychological Defenselessness sub-scale scores ($r=0.20$, $p<0.01$).

A meaningful and positive correlation was found between Total Academic Motivation score and Somatic Anxiety sub-scale scores ($r=0.22$, $p<0.01$).

A meaningful and positive correlation was found between Total Academic Motivation score and Personal Monitoring sub-scale scores ($r=0.18$, $p<0.01$).

A meaningful and positive correlation was found between Total Academic Motivation score and Physiological Defenselessness sub-scale scores ($r=0.19$, $p<0.01$).

A meaningful and positive correlation was found between Total Academic Motivation and Total Performance Anxiety scores ($r=0.21$, $p<0.01$).

4. Conclusion, Discussion and Suggestions

4.1. Conclusion and Discussions

The findings in this study demonstrated that the pre-service music teachers' music performance anxiety levels and academic motivation levels could be considered moderate. Based on this result, it can be said that the pre-service music teachers experience performance anxiety but not on a high level. Otacıoğlu's (2016b) study on the music performance anxiety of the students receiving professional music education, suggested that the music performance anxiety of the pre-service music teachers was on medium level. His conclusion supports this study's results. Music teacher candidates perform throughout their career and education lives. While low level of performance anxiety may affect their performance positively, high level of performance anxiety may even end their careers (Baydağ & Alpagut, 2016). For this reason, pre-service music teachers' performance anxiety should always be under control.

In this research, it was also concluded that pre-service music teachers' academic motivation is on medium level. This result supports the conclusion of Şeker's (2017) study on the levels of academic motivation of pre-service music teachers. According to Küçükosmanoğlu's study results, academic motivation of music teachers is on high level in all sub-dimensions except for the amotivation. High level of academic motivation of the pre-service music teachers increases their enthusiasm towards the field and increases their willingness to participate in the fields where they will perform (Karagüven, 2012). Increasing music teacher candidates' academic motivation will affect their participation in performances in a positive way.

A meaningful and positive correlation was found between pre-service music teachers' music performance anxiety levels and their academic motivation levels. However, this correlation can be defined as a weak relationship. When the relationships between the sub-scales are considered, it can be observed that the strongest and the most positive correlation is found between amotivation and psychological defenselessness sub-scale scores; extrinsic motivation- introjected regulation and negative performance sub-scale scores; extrinsic motivation- introjected regulation and total music performance anxiety score; amotivation and total music performance anxiety score; extrinsic motivation- introjected regulation and psychological defenselessness sub-scale scores; and extrinsic motivation- external regulation and somatic anxiety sub-scale scores.

When literature review was conducted, no study showing the relations between music performance anxiety and academic motivation was found. On the other hand, there are studies showing the relations with different variables: While Otacıoğlu (2016a) revealed a positive and strong relationship between musical self-esteem and music performance anxiety. Bahadır (2016) revealed that there isn't a significant relationship ($p=0.06$) between family expectations and music performance anxiety. In another study, Otacıoğlu (2016b) revealed a positive and strong relationship between performance anxiety and academic achievement. Şeker (2017), on the other hand, conducted a study in which he demonstrated the relationship between academic motivation and academic self-efficacy and found the relationship weak and positive. Clark, et al. (2014) examined the factors of intrinsic

motivation to find out that to know and experience stimulation contributed positively to academic performance through academic integration. Aktaş (2017) found a positive and weak relationship between academic motivation and academic self-efficacy. Alemdağ, Öncü & Yılmaz (2014) studied the relationship between academic motivation and academic self-efficacy and found moderate and positive relations. Yılmaz, Taşkesen & Taşkesen (2016) couldn't find any correlation between academic motivation and academic achievement. Amrai, et al. (2011) found positive and significant correlation between academic motivation and academic achievement in their study. Areepattamannil & Freman (2008) conducted a research that revealed moderate and positive correlation between academic motivation and academic self-esteem.

As a result of this study, it is observed that the strongest positive correlation is found between amotivation and psychological defenselessness sub-scale scores; between extrinsic motivation-introjected regulation and negative performance perception; between extrinsic motivation-introjected regulation and total music performance anxiety score; between amotivation and total music performance anxiety score; between extrinsic motivation- introjected regulation and psychological defenselessness sub-scale scores; and between extrinsic motivation- external regulation and somatic anxiety sub-scale scores. Based on this, it can be said that the extrinsically motivated (reward, grade etc.) students develop a negative perception towards performance; extrinsically motivated students who internalize the behavior later have troubles with controlling themselves during the performance; students with somatic anxiety who go through high levels of anxiety are highly extrinsically motivated students who determine their behaviors according to the thoughts of others; and students who are not motivated for the performance have high levels of music performance anxiety. In Karagüven's (2012) study it is stated that motivation is one of the key factors for a student to participate in activities, which is a statement that supports the opinion above.

The fact that this study associates academic motivation and music performance anxiety shows its strength. The study showed that there is also a weak relationship between music performance anxiety levels and academic motivation levels of pre-service music teachers This shows that the pre-service music teachers' levels of academic motivation affect their music performance anxiety.

4.2. Suggestions

As a result of the this study, it was concluded that the pre-service music teachers have a medium level of performance anxiety. Students' performances are expected to get better once their level of performance anxiety gets lower. In order to achieve this;

- A lecture on the strategies that decrease the performance anxiety level may be added to curriculum of music education institutions.
- Academicians can be informed about strategies that will decrease performance anxiety and students can apply these strategies in individual instrument classes.
- Students should participate in concert activities regardless of their level and they should gain plenty of experience in performing on stage.
- By adding elective courses such as yoga and meditation to the curriculum of music education institutions, students' performance anxiety can be reduced.

As a result of the study, it was concluded that the pre-service music teachers have a medium level of academic motivation. In order to increase the academic motivation;

- Activities that will make students enthusiastic about their department can be arranged. (Instrument days, festivals in which the whole department will participate).
- Students can be made enthusiastic about their field by doing their internships in various institutions related to their field of study (i.e. Primary, Secondary, High School, University) during their education (not only the last year) and their academic motivation can be increased.

For the researchers;

- The results of the study showed a meaningful relationship between the levels of academic motivation and music performance anxiety. The relationship of academic motivation and music performance anxiety with different variables (self-confidence, self-efficacy, self-esteem etc.) can be examined.
- The research can be developed by repeating the study with different scaling tools. (observation, interviews etc.)
- The sample group of the study was selected by using the method of convenience sampling and it was found that the academic motivation levels and performance anxiety levels did not differ between universities. The research can be repeated by changing the sample group.

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