

Some Variables Affecting the Musicality of MSU-IIT CED Students: Basis for Musical Enrichment

Tisha Tiffany C. Buagas, Adeline S. Danaoto, Enrico C. Riconalla, Arlene Reyes,
and Adelfa C. Silor

Abstract—This study was an attempt to determine the relationship between some variables affecting the musicality through musical skill tests at different levels of the students. To compose the pool of respondents, the researchers gathered data from 60 students equally divided among the different departments in the College of Education. After tabulating the data gathered in the level of musicality questionnaires and in the performance tests results revealed students had an average level of musicality and there were some variables did not affect the musicality of the students. However, there was a significant relationship between educational attainment of the respondents' mother and their musical performance in Distorted Tunes Test, the respondents' participation in musical activities and their musical performance test in Solfeggio, the membership of the respondents in music ensemble and their musical performance in Solfeggio, the respondents' availability of musical instruments and their musical performance in Delosis Musical Listening Test, the respondents' attitude towards music and their musical performance in Distorted Tunes Test.

Keywords—Musicality, Musical Instrument, Solfeggio, Delosis.

I. INTRODUCTION

MUSIC is the catalyst of ecstasy both to young and adult. It plays the central role of arousing the emotions of the listeners. All of us are given different and unique abilities, whether talent or skill, which we develop and enhance as we go on in our daily lives. Music plays a vital role in every human soul. It is one way of creating and expressing our deep thoughts and emotions. There is an intense connection between music and emotion that gives a subjective effect on the emotion of the listener. Musical development is a major issue in music education. Music educators' actions are based on

Tisha Tiffany C. Buagas, is with the MSU-Iligan Institute of Technology, Iligan City, Philippines. (email: tishiatiffany.buagas@g.msuiit.edu.ph)

Adeline S. Danaoto is with the MSU-Iligan Institute of Technology, Iligan City, Philippines. (email: Adeline.danaoto@g.msuiit.edu.ph)

Enrico C. Riconalla is with the MSU-Iligan Institute of Technology, Iligan City, Philippines. (mail: enricoriconalla@yahoo.com)

Arlene Reyes is with the MSU-Iligan Institute of Technology, Iligan City, Philippines. (email: arlene.reyes@g.msuiit.edu.ph)

Adelfa C. Silor is with the MSU-Iligan Institute of Technology, Iligan City, Philippines. (email: adelfa.silor@g.msuiit.edu.ph)

their ideas about the musical capabilities children possess at various ages and the way these capabilities change. These ideas rest largely on intuition, personal experience, and tradition, and while they should not be dismissed, they are clearly capable of improvement and refinement. The study is an attempt to determine the relationship between some variables affecting the musical skill tests at different levels of the students. The researchers would like to find out if the variables do affect the musicality through musical skill tests among the students.

The theory of multiple intelligences developed by Howard Gardner has significantly influenced education in the last few decades. Gardner refers to the intelligences as ways of knowing and understanding yourself and the world around you. Gardner states that the musical intelligence emerges earlier than any of the other intelligences. He emphasizes that positive early childhood experiences, particularly those that explore the creative potential of music, are crucial to the development of the musical intelligence. If the musical/rhythmic intelligence is recognized as an autonomous, separate intelligence, the role of the educator in fostering the development of the musical intelligence is significant. In structuring a music curriculum which has as its goal, the development of the musical intelligence, emphasis needs to be placed on early childhood music education.

The so-called "Mozart effect" actually refers to two relatively distinct phenomena. One concerns short-term increases in spatial abilities that are said to occur from listening to music composed by Mozart. The other refers to the possibility that formal training in music yields nonmusical benefits. In pop culture, the "Mozart Effect" is a theory that is concerned with the transformational powers of music (usually classical) in areas of mental and physical health, child development, and holistic well-being. For music educator, Edwin Gordon stated that every human being is born with the some level of a capacity to develop musicality. Gordon calls this capacity "music aptitude". Exposing a child to quality early childhood experiences are the best way to insure a child will come close to reaching their full potential. The extent to which someone develops their musicality would be a measure of one's ability to audiate, which Gordon defines as the ability to hear and comprehend in one's mind the sound of music that is not or may never have been physically present^[1].

However, in the 2003 edition of his Philosophy of Music Education, Reimer returned to the issue of musicality and

elaborated upon its definition, origin, and means for development. Reimer uses the term “musical intelligence” rather than “musicality” possibly to differentiate between his concept of musicality and the view that musicality is equated with talent and skill. He acknowledges the work of Howard Gardner, who included musical intelligence amongst all the other human intelligences. Gardner’s theory provides support for elevating music as a school subject that requires intelligence just as language and math. Some previous assumptions about music intelligence were based on beliefs that music was not cognitive but a talent, skill, ability, or degree of musicality. Philosophers such as Bennett Reimer acknowledge that attention to the technical aspects of music is needed for the development of musicality. In 1989, Reimer addressed the need for balance between “the technique as a means for achieving expressive performance and technique as an end” (p.169). Reimer wrote that “heightened aesthetic experience,” which occurs through listening, comes to those who are truly musical.^[2]

II. LITERATURE REVIEW

The incorporation of music training from preschool to postsecondary education is common in most nations because involvement in music is considered a fundamental component of human culture and behavior. Music, like language, is an accomplishment that distinguishes us as humans.^[3] One of the implicit assumptions in the preceding analyses is that the starting tones of the songs that subjects sang, and the tones they actually sang, are both uniformly distributed. One can easily imagine a world where all pop songs start on one or two tones, and where subjects who performed well in this task are those who managed to form a mental representation of that one tone. Recall however that subjects did not necessarily begin singing the first tone of their chosen song - they were allowed to start anywhere in the song they liked. So even if pop songs tend toward a limited set of musical keys (which is a defensible notion) the distribution of starting tones should still be uniform.^[4] ‘Popular music pedagogy’ — alternatively called rock music pedagogy, popular music education, or rock music education — is a recent development in the field of music education consisting of the application of the systematic teaching and learning of rock music and other forms of popular music both inside and outside formal classroom settings. Popular music pedagogy tends to emphasize group improvisation^[5].

A child sweetly singing and a trained opera singer are on equal footing and both valued. . These inabilities can appear separately but some research shows that they are more likely to appear in tone-deaf people. Many of the tone-deaf people were able to work on their problem and by correcting their singing techniques, as well as releasing their constrictions, they have learned to sing in tune. “Tone deaf” singers often have severe constrictions around their vocal chords. “When tone deaf people have experienced enough discouragement because of their voice, they lose confidence in both voice and hearing.” They no longer trust their voice and hearing. Hearing becomes disconnected with their voice and such singers cease to correct

the way they sing by means of hearing. A tone-deaf researcher, “The term tone deafness and the associated medical term amusia have unfortunately been applied somewhat loosely by medical practitioners, laypersons, educators, and psychologists of a board range of evident and supposed musical deficits^[6]. Music aids in text recall. One experiment created a three verse song with a non-repetitive melody; each verse had different music. A second experiment created a three verse song with a repetitive melody; each verse had exactly the same music. Another experiment studied text recall without music. The repetitive music produced the highest amount of text recall; therefore, music serves as a mnemonic device^[7]. In a survey both music teachers who had been music majors in college and music teachers who had not been music majors. Her survey revealed that non-music majors almost completely rejected the standards^[8]. One experiment involved memorizing a word list with background music; participants recalled the words 48 hours later. Another experiment involved memorizing a word list with no background music; participants also recalled the words 48 hours later. Participants who memorized word lists with background music recalled more words demonstrating music provides contextual cues^[9].

III. METHODS USED/DESIGN

This study used the descriptive-correlational method of research. This method identified the relationship of the profile and the musicality through musical skill tests among students in College of Education at Mindanao State University – Iligan Institute of Technology. The respondents of this study were the select 2nd year students in the College of Education at MSU – Iligan Institute of Technology. First, the respondents filled-out a self-administered questionnaire. The researchers decided to use the questionnaire as tool for gathering the respondent’s data. The respondents in the study were sixty (60) students in the College of Education and were equally divided among the five departments of the college. Both genders were equally represented in the study.

IV. FINDINGS/ANALYSIS

TABLE I
COMPUTED CORRELATION COEFFICIENT FOR THE RELATIONSHIP BETWEEN EDUCATIONAL ATTAINMENT OF RESPONDENTS MOTHER AND THEIR MUSICAL PERFORMANCE TEST

Educational Attainment (Mother) versus	Computed Spearman Rank Correlation Coefficient	P-Value	Remark
LEVEL OF MUSICALITY IN SOLFEGGIO	0.110	0.402	Not Significant
DISTORTED TUNES TEST	0.320	0.013	Significant
DELOSIS MUSICAL LISTENING TEST	-0.072	0.583	Not Significant

Legend: If P-value is less than $\alpha = 0.05$ (level of significance), then the test is significant (i.e., there is a significant relationship); otherwise, the test is not significant (i.e., there is no significant relationship).

The computed value of the coefficient of correlation 0.110 and -0.072 implied that there was no relationship between educational attainment of Respondent's Mother and the Musical Performance Test Scores in musicality in Solfeggio and Delosis musical listening test. This implies that educational attainment of Respondent's Mother does not affect the Musical Performance Test Scores of respondents in musicality in Solfeggio, and Delosis musical listening test. On the other hand, computed value of the coefficient of correlation at 0.320 implied that there was a significant relationship between educational attainment of Respondent's Mother and the Musical Performance Test Scores in Distorted tunes test. This implies that educational attainment of Respondent's Mother affects the Musical Performance Test Scores of respondents in Distorted tunes test. Hence, as the educational attainment of mother is high the score of respondents in distorted tunes test is also high.

TABLE II
COMPUTED CORRELATION COEFFICIENT FOR THE RELATIONSHIP BETWEEN PARTICIPATION IN MUSICAL ACTIVITIES AND THEIR MUSICAL PERFORMANCE TEST.

Participation in Musical Activities (1 – Yes, 0 – No) versus	Computed Point Bi-Serial Correlation Coefficient	P-Value	Remark
LEVEL OF MUSICALITY IN SOLFEGGIO	0.352	0.006	Significant
DISTORTED TUNES TEST	0.020	0.877	Not Significant
DELOSIS MUSICAL LISTENING TEST	0.073	0.581	Not Significant

Legend: If P-value is less than $\alpha = 0.05$ (level of significance), then the test is significant (i.e., there is a significant relationship); otherwise, the test is not significant (i.e., there is no significant relationship).

The computed value of the coefficient of correlation at 0.020 and 0.073 implied that there was no relationship between participation in musical activities of respondent and Musical Performance Test Scores in distorted tunes test and Delosis musical listening test. This implies that participation of respondents in Musical activities does not affect his/her Musical performance test in distorted tunes test and Delosis musical listening test.

TABLE III
COMPUTED CORRELATION COEFFICIENT FOR THE RELATIONSHIP BETWEEN MEMBERSHIP IN MUSIC ENSEMBLE AND THEIR MUSICAL PERFORMANCE TEST.

Member of Music Ensemble (1 – Yes, 0 – No) versus	Computed Point Bi-Serial Correlation Coefficient	P-Value	Remark
LEVEL OF MUSICALITY IN SOLFEGGIO	0.325	0.011	Significant
DISTORTED TUNES TEST	-0.246	0.058	Not Significant

DELOSIS MUSICAL LISTENING TEST	0.220	0.092	Not Significant
--------------------------------	-------	-------	-----------------

Legend: If P-value is less than $\alpha = 0.05$ (level of significance), then the test is significant (i.e., there is a significant relationship); otherwise, the test is not significant (i.e., there is no significant relationship).

The computed value of the coefficient of correlation at -0.246 and 0.220 implied that there was no relationship between respondent's membership in a music ensemble and Musical Performance Test Scores in distorted tunes test and Delosis musical listening test. This implies that respondent's membership in a music ensemble does not affect his/her Musical performance test in distorted tunes test and Delosis musical listening test.

TABLE IV
COMPUTED CORRELATION COEFFICIENT FOR THE RELATIONSHIP BETWEEN WHETHER THE RESPONDENTS HAVE MUSICAL INSTRUMENTS AT HOME AND THEIR MUSICAL PERFORMANCE TEST.

Has Musical Instruments At Home (1 – Yes, 0 – No) versus	Computed Point Bi-Serial Correlation Coefficient	P-Value	Remark
LEVEL OF MUSICALITY IN SOLFEGGIO	0.017	0.895	Not Significant
DISTORTED TUNES TEST	0.104	0.431	Not Significant
DELOSIS MUSICAL LISTENING TEST	0.269	0.037	Significant

Legend: If P-value is less than $\alpha = 0.05$ (level of significance), then the test is significant (i.e., there is a significant relationship); otherwise, the test is not significant (i.e., there is no significant relationship).

The computed value of the coefficient of correlation at 0.104 and 0.269 implied that there was no relationship between whether the respondent has musical instruments at home or not and Musical Performance Test Scores in musicality in Solfeggio and distorted tunes test. This implies that whether the respondents have musical instruments at home or not does not affect his/her Musical performance test in musicality in Solfeggio and distorted tunes test.

V. CONCLUSION

Based on the analysis the researchers had carried out, the respondents musical performance in Solfeggio were not influenced by their age, gender, gpa, religion, ethnic affiliation, parents combined monthly income, parents educational attainment, availability of musical instruments, and respondents' attitude towards music, but, was affected by the respondents' participation in musical activities and membership in music ensemble. Moreover, the respondents musical performance in the Distorted Tunes Test were influenced by the respondents' mother's educational attainment and respondent's attitude towards music. Furthermore, the respondent's musical performance in Delosis Musical Listening Test was affected by the respondents' availability of musical instruments.

REFERENCES

- [1] Gordon, E. E. (1997). *Learning sequences in music*. Chicago: GIA Publications, Inc.
- [2] Reimer, B. (2003/1989/1970). *A philosophy of music education*. Upper Saddle River, New Jersey: Pearson Education, Inc.
- [3] Yudkin, J. (2008). *Understanding Music* (p. 4). Upper Saddle River, NJ: Pearson/Prentice Hall
- [4] Levitin, D. J. (1994) Absolute memory for musical pitch: Evidence from the production of learned melodies *Perception & Psychophysics*, 56 (4), 414-423.
<http://dx.doi.org/10.3758/BF03206733>
- [5] Higgins, Lee and Campbell, Patricia Shehan, *Free to be Musical: Group Improvisation in Music* (Rowman & Littlefield Education, 2010)
- [6] Peretz, Isabelle. (2001). Brain specialization for music. *New evidence from congenital Amusia*. *New York Academy of Sciences*, 8,243-246.
- [7] Wallace, W. (1994). "Memory for music: Effect of melody on recall of text". *Journal of Experimental Psychology: Learning, Memory, and Cognition*, 20 (6), 1471-1485.
<http://dx.doi.org/10.1037/0278-7393.20.6.1471>
- [8] Byo, Susan. (1999, Summer). Classroom teachers' and music specialists' perceived ability to implement the national standards for music education. *Journal of Research in Music Education*. 47(2), 111-123.
<http://dx.doi.org/10.2307/3345717>
- [9] Smith, S. (1985). "Background music and context-dependent memory". *American Journal of Psychology*, 98 (4), 591-603.
<http://dx.doi.org/10.2307/1422512>