Encouraging Empirical Research: Findings from the Music Appreciation Classroom

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The inaugural issue of the *Journal of Music History Pedagogy* contained one of the first attempts at a comprehensive bibliography of scholarly writings pertaining to the field; however, one group of works was noticeably absent from this list—those involving empirical research.[1] Employed more often in the sciences than the humanities, empirical research seeks to gain knowledge through observation or experimentation and usually involves the collection and interpretation of quantitative or qualitative data. Although not a common methodology for most historical musicologists, empirical techniques are often employed by systematic musicologists who study such fields as music cognition, music therapy, and music psychology. Journals such as *Pscyhomusicology* and *Music Perception* frequently contain studies based on empirical research, and the *Empirical Musicology Review*, a quarterly online journal introduced in 2006, is exclusively devoted to empirical research in music.[2]

Empirical research also plays a significant role in music pedagogy.[3] In empirical research studies, scholars can conduct controlled experiments with students and analyze quantitative or qualitative data to help isolate effective teaching strategies, compare curricular options, investigate factors that influence learning, or examine other teaching and learning components. Researchers in music education regularly employ empirical methodologies to improve the quality of teaching in the fields of instrumental and vocal pedagogy. Journals in music education, such as the *Journal of Research in Music*

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1. C. Matthew Balensuela, "A Select Bibliography of Music History Pedagogy Since 2000 with a List of Papers Read at the 2009 Teaching Music History Day," *Journal of Music History Pedagogy* 1, no. 1 (2010): 61–66, http://www.ams-net.org/ojs/index.php/jmhp/article/view/13.

2. http://emusicology.org/v5n4/.

3. Guido Adler included pedagogy as one of his components of systematic musicology. See Guido Adler, "Umfang, Methode und Ziel der Musikwissenschaft," *Vierteljahrschrift für Musikwissenschaft* 1 (1885): 5–20.

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Education and the *Bulletin of the Council for Research in Music Education,* as well as dissertations, often contain empirical studies that seek to find ways to improve teaching and learning in private studio or ensemble settings.

Many historical musicologists, however, shy away from empirical research and analysis, even though research of this type can be very informative, especially when it comes to pedagogical concerns. In the past few decades, several empirical studies relating to music history pedagogy have appeared in the previously mentioned journals as well as a few dissertations. Most of this research deals with one specific aspect of music history pedagogy—the teaching of collegiate-level music appreciation courses. These studies can be divided into three main areas: (1) relational and descriptive studies that examine the effects of students' backgrounds and musical preferences; (2) studies that examine the overall effectiveness of music appreciation courses; and (3) experimental studies that investigate the effectiveness of specific teaching strategies within music appreciation courses. The findings from these studies can teach us about our student populations and offer ideas for improving our teaching methods. More importantly, this small body of literature may stimulate ideas for further areas of research.

Student Background and Musical Preferences

Although many of our music majors come to our programs with similar background and training, the diverse population of non-major music appreciation students poses a special pedagogical challenge. Several researchers have endeavored to identify how different characteristics of students' backgrounds influence their music appreciation experience. The findings from these studies provide useful information about the populations we teach.

In a 2001 study, Robert Woody and Kimberly Burns sought to examine the relationship between certain musical background factors and students' levels of appreciation of classical music.[4] They defined "appreciation" as having an appropriate recognition of the music's expressivity and a willingness to listen to the music on one's own time. Subjects completed a questionnaire about their musical preferences, listening habits, exposure to classical music, and beliefs about the emotionality of music. Next, they listened to four classical excerpts, rated the expressive intensity of those excerpts, and indicated whether they would want to listen to the piece independently. Woody and Burns found that certain background factors had a significant relationship with subjects' responses. Those subjects who had indicated having previous emotional experiences with classical music gave higher expressivity ratings to

4. Robert H. Woody and Kimberly J. Burns, "Predicting Music Appreciation with Past Emotional Responses to Music," *Journal of Research in Music Education* 49, no. 1 (Spring 2001): 57–70. In this paper "classical" is used in the broader sense while "Classical" will refer to the specific musical era.

the classical excerpts and were more likely to want to listen to the piece on their own. These results led the researchers to suggest that music appreciation teachers should emphasize the expressive possibilities of classical music, rather than focusing just on intellectual components.

Barbara Lewis and Charles Schmidt also investigated subjects' responses to music in a 1991 study examining the relationship between personality type and listener response.[5] The experimenters analyzed the correlation between subjects' personality types, as indicated by the Myers-Briggs Type Indicator (MBTI) assessment, and their perceptions of how strongly they respond to music in different ways (cognitively, physically, emotionally, etc.). They found that subjects who had a high magnitude of responsiveness to music tended to be located on the "intuition" end of the MBTI Sensing-Intuition continuum, thus suggesting that a student's personality type does relate to how he or she responds to music. [6] Based on the information subjects provided on the listener response test, Lewis and Schmidt encourage teachers to be cautious of the over-emphasis of intellectualization in the music appreciation class and suggest allowing students to have the opportunity to respond to music in their own characteristic way, be it physically, artistically, or in some other manner.

A 2009 study by Phillip Hash attempted to identify which era(s) of classical music incoming music appreciation students preferred and whether the students' musical training affected those preferences.[7] Subjects rated their preferences for fifteen musical examples (three from each of the following eras: Renaissance, Baroque, Classical, Romantic, and Twentieth Century) using a seven-point Likert scale.[8] Hash found that these undergraduates preferred music from the Classical era significantly more than the other eras and that they preferred Baroque, Classical, and Romantic music significantly more than either Renaissance or Twentieth-Century music. Thus, Hash suggests that music appreciation teachers sequence their courses by introducing music from the preferred Classical and Romantic eras first and the least-preferred Renaissance and Twentieth-Century eras last, so that students can begin the course with music that is more accessible to them.

Hash is one of the only scholars to focus on the undergraduate non-musician population when investigating musical era preferences, but other general music preference studies can also provide some useful insights. Alfred LeBlanc examined the musical preferences and listener tolerance ("open-earedness" as

5. Barbara E. Lewis and Charles P. Schmidt, "Listeners' Response to Music as a Function of Personality Type," *Journal of Research in Music Education* 39, no. 4 (Winter 1991): 311–21.

6. The MBTI measures subjects' inclinations toward particular poles of four dichotomies: Extraversion-Introversion, Sensing-Intuition, Thinking-Feeling, and Judgment-Perception.

7. Phillip M. Hash, "Undergraduate Non-Music Major Preferences for Western Art Music," *Contributions to Music Education* 36, no. 1 (2009): 9–24.

8. A Likert scale is a psychometric scale in which subjects are asked to evaluate a given statement, usually by stating their level of agreement.

he called it) of subjects of all ages, including college students.[9] He found that young adults, who make up much of the music appreciation population, have a higher tolerance and greater preference for art music second only to young children. LeBlanc suggests that college is one of the most favorable environments for teaching listening skills and exposing students to unfamiliar music, a reassuring notion for those who find themselves in collegiate classrooms.[10]

Course Effectiveness

The most basic of all research questions surrounding the teaching of music appreciation is also the most difficult to answer: do music appreciation courses teach students to appreciate music? Although in some schools the main objective of these courses is to increase students' knowledge about music and music history (and it is true that many courses are labeled as "Introduction to Music" rather than "Music Appreciation"), I believe most professors sincerely want their students to acquire some fundamental level of appreciation for music. Unfortunately, measuring course effectiveness is quite complicated for the empirical researcher, due to the fact that "music appreciation" can be difficult to define and hard to measure. Nevertheless, a few scholars have managed to conduct some insightful experiments relating to the effectiveness of music appreciation courses.

One of these experiments, by Harry Price and Pamela Swanson, measured changes in musical attitudes, opinions, and knowledge for undergraduate students who took a ten-week music appreciation course.[11] At the beginning and end of the term, students listened to twenty 30-second excerpts of classical music, after which they rated their opinion of the music and indicated what basic facts they knew about the excerpt (composer, title, era, etc.). Price and Swanson found that the subjects had a significant gain in factual knowledge from the beginning to the end of the term, but no significant difference in opinion of the works, suggesting that increased knowledge does not necessarily result in increased appreciation. The researchers note that

9. Alfred LeBlanc, "The Effect of Maturation/Aging on Music Listening Preference: A Review of the Literature," (paper, Ninth National Symposium on Research in Music Behavior, Cannon Beach, OR, March 1991); Albert LeBlanc, Wendy Sims, Carolyn Siivola, and Mary Obert, "Music Style Preferences of Different Age Listeners," *Journal of Research in Music Education* 44, no. 1 (Spring 1996): 49–59.

10. For a good review of literature relating to the potential for individual's musical preferences to be modified, see Leif Finnäs, "How can Musical Preferences be Modified? A Research Review," *Bulletin of the Council for Research in Music Education* 102 (1989): 1–58.

11. Harry E. Price and Pamela Swanson, "Changes in Musical Attitudes, Opinions, and Knowledge of Music Appreciation Students," *Journal of Research in Music Education* 38, no. 1 (Spring 1990): 39–48.

their finding replicates findings of previous experiments done with other populations.[12]

Teaching Strategies

Unfortunately, the course-effectiveness studies mentioned above offer little practical advice, as they fail to provide insight into what caused their lack of success. Whether a course meets its educational objectives depends on many variables: the textbook used, the listening examples provided, the teacher's personality, the teaching strategies involved, and other factors. This is where experimental studies can be very informative. In controlled experiments, researchers can isolate one of these variables and engage in comparative experimental studies to help determine which teaching methods and materials are most effective. Results of these experiments can help teachers make intelligent, research-supported choices when deciding how to structure and teach their music appreciation classes.

Educational researchers have identified many different types of instructional methods, including the lecture, lecture-demonstration, computer-assisted instruction, auto-tutorial instruction, problem-solving approach, and Personalized System of Instruction (PSI). Of these, the lecture and lecture-demonstration are probably the primary methods of instruction in most music appreciation classrooms today, yet these are certainly not the only options available to professors. Lawrence Eisman investigated the viability of a problem-solving approach in the music appreciation classroom and concluded that it was not significantly different in effectiveness than the lecture-demonstration method in developing perceptive listening skills.[13] Both Joseph Jumpeter and Richard Holz have conducted studies using undergraduate music appreciation courses to compare the effectiveness of the lecture-demonstration method with that of PSI, an individually paced, mastery-oriented teaching method developed by Fred Keller in the 1960s.[14] The results of these studies showed that PSI was at least equal to, if not marginally better than, the

12. In an earlier study, Price had also found a lack of significant relationship between gains in knowledge about classical music and positive opinions of classical composers: Harry E. Price, "The Effect of a Music Appreciation Course on Students' Verbally Expressed Preferences for Composers," *Journal of Research in Music Education* 36, no. 1 (Spring 1988): 35–46.

13. Lawrence Warren Eisman, "The Formulation and Testing of a Problem-Solving Approach to the Development of Perceptive Listening Skills in Selected College Music Appreciation Classes" (EdD diss., New York University, 1975).

14. Joseph Jumpeter, "Personalized System of Instruction Versus the Lecture-Demonstration Method in a Specific Area of a College Music Appreciation Course," *Journal of Research in Music Education* 33, no. 2 (Summer 1985): 113–22; Richard Holz, "The Effect of Behavioral Instruction on Music Achievement, Attitudes, and Music Selection Behavior in an Introductory College Music Course" (EdD diss., Columbia University, 1978). See the respective articles for specifics as to how PSI was implemented in each experiment.

lecture-demonstration method at increasing students' achievement and favorable responses toward classical music.

Since the 1980s, cooperative learning pedagogies have become increasing popular in the field of education.[15] Teaching strategies involving cooperative learning in the music appreciation classroom may have important benefits, as several experiments have shown in the last two decades. Thomas Smialek, Renee Boburka, Martha Holloway, and Glenn Hosterman have conducted experiments comparing the achievement levels of students who engage in cooperative learning activities during a music appreciation course with those who do not.[16] Examples of cooperative activities used in the studies included group listening exercises for musical elements and musical style, collaborative composition projects, form determination exercises, and others. In all three studies, those subjects who were involved in cooperative learning activities scored significantly higher on tests of critical listening skills.

While the above studies examined the effectiveness of general educational strategies, there are some music-specific pedagogical issues that must also be considered. For example, several studies have attempted to determine whether it is more beneficial to provide students with historical or analytical information about the pieces they study. In a 1992 study, Jessica Halpern had three groups of students listen to a collection of classical pieces and rate their response to each piece using a Likert scale.[17] One group read historical information about each work before listening, one group read analytical information about each work before listening, and the final control group did not read anything. She found that the group that received the historical information rated a significantly higher enjoyment level of the listening experience than the control or analytical groups. Annette Zalanowski also concluded that providing analytical information to music appreciation students did not increase their appreciation of absolute music. Instead,

15. In the education literature, "cooperative" and "collaborative" learning tend to have different, yet unstandardized, definitions. I use the terms interchangeably in this essay to include any group activities in which two or more students work together to complete a specific task or develop knowledge or skills.

16. Thomas Smialeck and Renee Boburka, "The Effect of Cooperative Listening Exercises on the Critical Listening Skills of College Music-Appreciation Students," *Journal of Research in Music Education* 54, no. 1 (Spring 2006): 57–72; Martha Holloway, "The Use of Cooperative Action Learning to Increase Music Appreciation Students' Listening Skills," *College Music Symposium* 44 (2004): 83–93; and Glenn Lewis Hosterman, "Cooperative Learning and Traditional Lecture/Demonstration in an Undergraduate Music Appreciation Course" (EdD diss., Pennsylvania State University, 1992).

17. Jessica Halpern, "Effects of Historical and Analytical Teaching Approaches on Music Appreciation," *Journal of Research in Music Education* 40, no. 1 (Spring 1992): 39–46.

encouraging students to form free mental images while listening resulted in higher enjoyment ratings.[18]

On the other hand, Lewis Gordon was more concerned in his 1996 study with how the analytical and historical approaches affected students' listening skills, specifically the ability to discern meter and tonality.[19] He conducted his experiment over an entire semester of a music appreciation course, with students divided into three groups: historical, analytical, and contextual. The historical group used a historically oriented textbook and received lectures focusing mostly on history and biography. The analytical group used a more analytically oriented textbook with lectures focusing more on musical elements and genres. The contextual group spent the first portion of the term learning to aurally analyze works and spent the remainder of the term studying works from the major historical eras. Gordon found that the historical group did not show significant improvement of listening skills at the end of the term, the analytical group showed a modest gain in tonality-discernment scores, and the contextual group showed significant improvement in their ability to discern both meter and tonality. Based on his research, Gordon advocates using approximately the first half of a music appreciation course to teach musical elements and style analysis and then having students apply their listening skills to music of the different eras for the remainder of the term.

Camille Smith also used different textbooks with two groups of music appreciation students in her 1982 study.[20] She chose one textbook that emphasized listening sensitivity and another that emphasized intellectual understanding to see which was more effective in increasing perceptive listening skills and appreciation of classical music. Like Price and Swanson, Smith found that neither approach was more effective in developing more positive attitudes toward music. She did find that subjects who used the intellectual textbook showed greater gains in listening perception, but admits that some of her measurement tools may not have succeeded in measuring exactly what they were supposed to measure.

The above studies have generally tested the effectiveness of broad pedagogical strategies (historical versus analytical, PSI versus lecture, etc.); however, experimental research can also be used to find effective ways to achieve very specific educational objectives. For example, in their 1992 study, Claire McCoy and Mark Ellis attempted to determine which of three instructional

18. Annette Zalanowski, "The Effects of Listening Instructions and Cognitive Style on Music Appreciation," *Journal of Research in Music Education* 34, no. 1 (Spring 1986): 43–53.

19. Lewis Gordon, "College Music Appreciation: Pedagogical Approaches and Preliminary Findings," *College Music Symposium* 36 (1996): 103–13.

20. Camille M. Smith, "Effects of Two Music Appreciation Texts on Students' Musical Perception and Aesthetic Judgment," *College Student Journal* 16, no. 2 (Summer 1982): 124–30.

strategies was the most effective way to teach meter discrimination.[21] They divided their subjects into four groups, three of which received definitions of "meter," "duple meter," and "triple meter," plus a control group. The first group then listened to examples of different meter types (basically, the lecture-demonstration method). The second group listened to examples that included an added click track to help define the beat. Members of the third group were asked to make large muscle movements to indicate the beat while listening to the examples. The control group received no instruction. McCoy and Ellis found that the movement group showed significantly more improvement than the other groups on a meter discrimination test, and they strongly encourage music appreciation teachers to have their students employ large muscle movements when teaching meter discrimination.

* * *

The above review reveals a small, but promising, collection of empirical studies that definitely deserve mention in any discussion of music history pedagogy sources. Although many musicologists may not have a strong familiarity with empirical methods, we should be careful not to overlook this methodological approach as we continue to engage in research in the field of music history pedagogy. Accepting the validity of this type of research opens up many possible avenues of exploration and investigation.

Although I have attempted to provide an overview of relevant empirical literature, this review and bibliography are still just a beginning. They do not provide a comprehensive view of all the empirical research relevant to the teaching of music appreciation or music history, only some studies that deal with undergraduate non-music major populations. We could learn a lot by looking at results of empirical studies done in elementary and secondary music classrooms, as well as general education studies that examine classroom-teaching strategies for students of all levels. The studies discussed also seemed to focus on music appreciation classes that emphasized western art music. Many appreciation classes also incorporate popular and world music into their curriculum, and these courses would also provide fruitful grounds for empirical research.

This review also did not include a critical evaluation of the empirical studies discussed, which is the next important step in determining which findings are most conclusive and relevant. For example, we can compare the value of Jessica Halpern's and Lewis Gordon's studies regarding the comparison of the historical versus analytical approaches to teaching music appreciation.

21. Claire W. McCoy and Mark C. Ellis, "The Effects of Short-Term Instruction on the Ability of College Nonmusicians to Discriminate Meter," *Bulletin of the Council for Research in Music Education* No. 114 (Fall 1992): 35–45.

Halpern's finding that the historical approach was better than the analytical approach was based on an experiment in which students read a short passage of information before listening to the music. This experimental design, even though it used music appreciation students, led to findings that are probably more helpful to those who write program notes than those who teach music appreciation. Lewis Gordon's experiment, on the other hand, was designed to test the effects of the two teaching approaches over a typical semester-long course, the results of which may be more relevant to music appreciation teachers. Gordon also used a pretest-posttest design in contrast to Halpern's posttest-only design, thereby strengthening the conclusivity of his findings of differences between groups.

It is unfortunate that our field lacks a large body of useful empirical research studies that can inform our teaching, and we should make it a goal to invest more time and energy into this type of research. However, since many musicologists are not trained in empirical methods, this might require some outside help. In order to develop high quality experiments, it will be important to consult with experienced empiricists. Our colleagues in education or psychology departments can serve as valuable collaborators in our ventures into empirical research. Many schools also have an Office of Research, the staff of which may be extremely helpful in navigating through the special protocols that are involved when engaging in experimental research with human subjects. Those stepping into the empirical field for the first time may also want to consider replicating an existing study. As the three cooperative-learning studies showed, empirical research results are always more compelling and meaningful if they can be replicated.

In the growing scholarship of music history pedagogy, many presenters and authors have begun to question some of the traditional approaches to teaching music appreciation and music history courses. These scholars usually make a case in favor of a particular teaching approach that they believe to be especially valuable based on their personal experiences in the classes they teach; however, their arguments will be much more persuasive to other teachers (not to mention administrators, colleagues, publishers, and others who influence teaching decisions), when they can substantiate their claims with the findings of empirical research studies.

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