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ICTUS OR REBOUND? THE EXPERIENCE OF BEHIND-THE-BEAT PLAYING
IN ORCHESTRAL CONDUCTING

DMA Project

A DMA Project submitted in partial fulfillment of the
requirements for the degree of Doctor of Musical Arts in the
College of Fine Arts at the University of Kentucky

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ABSTRACT OF DMA PROJECT

ICTUS OR REBOUND? THE EXPERIENCE OF BEHIND-THE-BEAT PLAYING IN ORCHESTRAL CONDUCTING

The origin of playing behind-the-beat is attributed to the Hungarian conductor Arthur Nikisch (1855-1922), who is one of the most important figures in the history of the art of conducting. Nikisch, serving as Music Director of the Boston Symphony Orchestra, the Berlin Philharmonic, and the Leipzig Gewandhaus Orchestra during a critical moment in the development of orchestral playing, influenced a generation of conductors who followed. Behind-the-beat playing, as many conductors and musicians refer to in describing experiences of top professional orchestral musicians, is a prevailing characteristic of theirs, not often observed in amateur orchestras and their conductors. It is an idea that is opposed to the notion of “time-beating,” which has come to have a negative connotation as not constituting expressive musicianship. “Time-beating” conveys that the conductor is emphasizing the beats (ictus). This kind of conducting describes ictus-focused-conducting, where one expects the sound to arrive exactly on the beat or on the ictus. In contradiction with this notion, behind-the-beat playing, evidenced in top professional orchestras and conductors, suggests that the sound happens behind the beat; after the ictus gesture of the conductor.

This project argues that rebound-focused-conducting, as opposed to ictus-focused-conducting, allows and facilitates behind-the-beat playing, which is a natural and universal phenomenon in the highest-levels of orchestral music making. Through a thorough examination of conducting literature and empirical studies, this project reveals that propensity for rebound-focused-conducting will yield many benefits for an orchestra. In any level of conducting, understanding and application of the behind-the-beat concept will facilitate organic communication with the orchestra, smoother musical connections, more flow, warmer tone production, and more mature and organic phrasing. Further study on the relationship between conducting gesture and sound response will contribute to this mysterious and under-discussed field. A deeper investigation of

this relationship may be able to answer, for example, why in different circumstances the degree of “behind-the-beat” playing increases or decreases.

KEYWORDS: Behind-the-beat Playing, Conducting, Orchestral Conducting, Ictus, Rebound, Conducting Gesture and Response Synchronization

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DEDICATION

To my teachers, mentors, and colleagues, whose passionate efforts through the years provided the necessary knowledge, experiences, opportunities, and realizations in my evolution as a conductor and musician.

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Chapter 1: Introduction

Perhaps it is somewhat like a masterful artist: a painter, who first starts learning the art by coloring within the lines, must eventually let go of the lines and just paint. The art of conducting is the same way: first one must start by learning the basics of “beating time,” until he or she is able to truly conduct the music. Anton Seidl, Music Director of the New York Philharmonic in the 1890s, who conducted the world premiere of Antonín Dvořák's Symphony No. 9, "From the New World," writes the following in his essay “On Conducting,” published in 1895:

The ability to conduct is a gift of God with which few have been endowed in full measure. Those who possess it in abundance do not wish to write about it, for to them the talent seems so natural a thing that they cannot see the need of discussing it. This is the kernel of the whole matter. If you have the divine gift within you, you can conduct; if you have not, you will never be able to acquire it. Those who have been endowed with the gift are conductors; the others are time-beaters.¹

Seidl's reference to “the gift”² includes many traits of a great conductor, one of which is showing the beats. His statement, then, that those without the gift are “time-beaters,” implies that a gifted conductor is not a “time-beater.”³ In another reference to “time-beating,” Adolf Schmid, the Austrian composer, author, conductor, and arranger, writes in *The Language of the Baton* published in 1937: “The expression, ‘to beat time,’ has purposely been avoided, since there is

¹ Anton Seidl, *On Conducting* (O'Connor A.C.T.: Parrot Press, 2012), 2.

² Seidl, 2.

³ Seidl, 2.

obviously a vast gulf between conducting and 'time-beating.' "⁴ The "vast gulf between conducting and time-beating," may be referring to many different things. In describing experiences of top professional orchestral musicians, many conductors and musicians refer to the phenomenon of behind-the-beat playing as a prevailing characteristic of theirs, not often experienced in amateur orchestras and their conductors. The premise of behind-the-beat playing is opposed to the notion of "time-beating,"⁵ which describes ictus-focused-conducting, where one expects the sound to arrive exactly on the beat or on the ictus. In contradiction with this notion, behind-the-beat playing suggests that the sound happens behind the beat; after the ictus gesture given by the conductor.

Although behind-the-beat playing is prevalent among top professional orchestras and conductors, most conducting manuals discuss the ictus as the precise moment when the sound should happen. This misconception leads conductors to inevitably focus on the ictus (beats) and to "beat time,"⁶ which Seidl and Schmid describe is what non-gifted conductors do. Ictus-focused-conducting restricts the orchestra, at any given level, from playing behind-the-beat. The contradiction regarding this concept in conducting manuals presents a conundrum for many conductors. If there is a correlation between playing on the ictus (on-the-beat) and the level of the conductor or the orchestra, this is not addressed as such. From the point of view of a student learning to become a

⁴ Adolf Schmid, *The Language of the Baton* (New York: G. Schirmer, 1937), 3.

⁵ Schmid, *The Language of the Baton*, 3; Seidl, *On Conducting*, 2.

⁶ Schmid, *The Language of the Baton*, 3; Seidl, *On Conducting*, 2.

conductor, the conducting manuals lack directions on growth and development towards a higher and more ideal level of understanding the inherent tendencies of top professional musicians with regards to the timing of their sound response to the ictus.

This project argues that rebound-focused-conducting, as opposed to ictus-focused-conducting, allows and facilitates behind-the-beat playing, which is a natural and universal phenomenon in the highest-level of orchestral music making. In order to do this, this paper explains the concept of behind-the-beat playing and shows the prevalence of behind-the-beat playing in top professional orchestras. It then discusses the shortcomings of conducting manuals that mislead conductors with instructions that contradict the concepts of behind-the-beat playing. It further discusses findings from a number of past empirical studies that reveal how musicians respond to the conducting gestures, and the relationship between behind-the-beat playing and the level of the orchestra. Finally, it explains the rationality of rebound-focused-conducting over ictus-focused-conducting. It argues that the correlation between behind-the-beat playing and the level of the orchestra implies that rebound-focused-conducting can raise the level of the orchestra.

Chapter 2: About Behind-the-beat Playing

Behind-the-beat playing refers to the orchestra playing later than the conductor's ictus gesture. It proposes that orchestras do not play on the ictus, as most conducting manuals instruct, but rather after the ictus gesture. In his essay "On Conducting" from 1895, Seidl writes that "the period of orchestral virtuosity, in which the whole aim was daintiness, refinement, and precision of execution, is past."⁷ According to Seidl, "already in his day Weber declared war against metronomical orchestra playing."⁸ Seidl served as a copyist and a musical assistant to Richard Wagner from 1872 to 1877. In describing his observations about Wagner he writes that "the strange, illustrative movements of his long baton startled and puzzled the musicians until they learned that the musical bars were not dominant, but the phrase, the melody, or the expression."⁹ Perhaps these comments are initial accounts of the changes of the trend in conducting and orchestral playing that eventually led to the rise of such conductors as Arthur Nikisch.

The origin of playing behind-the-beat is attributed to Nikisch (1855-1922), the Hungarian conductor who is one of the most important figures in the history of the art of conducting. During a critical moment in the development of

⁷ Seidl, *On Conducting*, 2.

⁸ Seidl, 4.

⁹ Seidl, 22.

orchestral playing, Nikisch served as the Music Director of the Boston Symphony Orchestra, the Berlin Philharmonic, and the Leipzig Gewandhaus Orchestra. He influenced a generation of conductors who followed. Christopher Seaman, a former principal timpanist of the London Philharmonic Orchestra and later a principal conductor of the BBC Scottish Symphony Orchestra, writes in *Inside Conducting*, published in 2013, that “The tradition of playing behind the beat was mainly established by Arthur Nikisch (conductor of the Berlin Philharmonic), following in the footsteps of Liszt and Wagner, who conducted in musical shapes rather than beats.”¹⁰ According to Charles Barber’s article from the Grove Music Online, Nikisch’s behind-the-beat playing tradition appears in “many continental European conductors, especially those trained in German opera houses.”¹¹ Barber reports that “[European conductors] train their orchestras to sound not on, but just after the visible beat.”¹² Before the time of traveling guest conductors, who conduct different orchestras all around the world, this was predominantly a “geographic distinction in the placing of pulse.”¹³ Barber also confirms the distinction, saying that “in British and North American schools, conductors and orchestras are trained to play ‘on the beat’; i.e. to produce the sound at the actual moment when the baton strikes the appropriate rhythmic juncture.”¹⁴

¹⁰ Christopher Seaman, *Inside Conducting* (United Kingdom: University of Rochester Press, 2013), 79.

¹¹ John Spitzer et al., "Conducting," Grove Music Online, 2001: 17. <https://doi-org.ezproxy.uky.edu/10.1093/gmo/9781561592630.article.06266>.

¹² Spitzer et al., "Conducting," 17.

¹³ Spitzer et al., 17.

¹⁴ Spitzer et al., 17.

However, this is not the case today. Today most professional orchestras exhibit behind-the-beat playing to a certain degree, but that degree varies. As Seaman reports in *Inside Conducting*, “today, there is a wide variety in how late orchestras play, depending on the style set by their conductors, past and present.”¹⁵ The ubiquitous presence of behind-the-beat playing among the top orchestras today is evidence that the phenomenon is not simply a style or a preference of certain orchestras and conductors. It is rather a natural and universal phenomenon that is displayed by most orchestras; the experience is simply exaggerated in more experienced, higher level orchestras. As Gunther Schuller explains in *The Compleat Conductor*, there is an “almost unavoidable natural time lag between a musician's impulse to play a note and its actual acoustical appearance,” because “the musicians, after all, are not machines.”¹⁶ Numerous additional sources discuss the phenomenon as so common an occurrence as to be described as habitual. According to Seaman, “most of the best orchestras have developed the habit of playing slightly late.”¹⁷ In *Vertical Plane Focal Point Conducting*, published in 1989, Leonard Atherton writes that, “many large ensembles with experience in playing the romantic repertory play ‘behind the beat.’”¹⁸ Similarly, Claudio Abbado, the late Italian conductor, who throughout his career served as the music director of many of the world’s most renowned orchestras, says (in this particular case about the Vienna

¹⁵ Seaman, *Inside Conducting*, 79.

¹⁶ Gunther Schuller, *The Compleat Conductor* (New York; Oxford: Oxford University Press, 1998), 421.

¹⁷ Seaman, *Inside Conducting*, 79.

¹⁸ Leonard Atherton, *Vertical Plane Focal Point Conducting* (Muncie, Ind.: Ball State University, 1989), 38.

Philharmonic) that they “never play on the beat.”¹⁹

After Seidl’s “On Conducting” from 1895, some sources appear in the mid to late 1900s that discuss the behind-the-beat playing phenomenon. These are few and mainly contain preliminary observations. In *Conducting Technique: For Beginners and Professionals*, published in 1966, Brock McElheran mentions observing behind the beat playing in ensembles conducted using a “hot stove beat.”²⁰ A “hot stove beat” refers to the style of conducting where the rebound is too quick. Although a useful technique in certain types of music, it is not a recommended default style. McElheran writes the following:

Don’t use a ‘hot stove beat.’ Many conductors give a slow downbeat and then flick their hand up quickly, as though they had accidentally touched a hot stove. This leads to playing behind the beat and lack of precision. Many second-rate conductors have this fault, especially poorer band men, but the writer has never seen a conductor of the first rank with this characteristic.²¹

It may be true that this style causes playing behind the beat. However, the kind of behind the beat playing McElheran refers to is the imprecise attacks displayed by an amateur orchestra. He comments that the orchestra cannot react to a conductor’s beat that is too quick.

The kind of behind-the-beat playing McElheran describes is not the same

¹⁹ Seaman, *Inside Conducting*, 79.

²⁰ Brock McElheran, *Conducting Technique for Beginners and Professionals* (New York: Oxford University Press, 1966), 33.

²¹ McElheran, *Conducting Technique*, 33.

kind of behind-the-beat playing experienced by top professional orchestras. The kind of behind-the-beat playing this project is concerned with is one displayed by professional orchestras and conductors of "the first rank."²² It is briefly mentioned in *The Beginning Conductor*, published in 1972, where Hugo D. Marple reports that some conductors seem to "insist on the delayed attack."²³ "In the delayed attack," Marple explains, "the conductor gives a preparatory and the downbeat and is well into the rebound before the attack is expected."²⁴ According to Marple, "this type of preparatory and attack [is] used most successfully with professional groups."²⁵ In *Face to Face with an Orchestra*, published in 1987, Don Moses along with Robert Demaree, Jr. and Allen Ohmes, describes a frequent case of a jarred young conductor who experiences an orchestra's behind-the-beat playing:

Young conductors sometimes give a downbeat, and then wait for the orchestra to play, instead of going on. That will not do. When the orchestra members are playing one beat, you prepare what they are to do next – *signalling to them the speed and manner of the next notes they are to play*. You should not be conducting with them, but one beat ahead of them; they should be trying constantly to catch up with you. The most frequent complaint young conductors make about orchestra - that they respond late - *is invariably a failure of the preparation beat*. The orchestra needs to know - to see- what sort of energy they should use to begin a phrase. They need to be able to see where the peak of that phrase will be, and what sort of cadence they will have to provide at the end. To show them these images, always one beat ahead, *you must have that image in your own ears one beat early*, convey it in the gesture you are making at that moment, and keep going.²⁶

²² McElheran, 33.

²³ Hugo D. Marple, *The Beginning Conductor* (New York: McGraw-Hill Book, 1972), 40.

²⁴ Marple, *The Beginning Conductor*, 40.

²⁵ Marple, 40.

²⁶ Robert W. Demaree, Don V. Moses, and Allen F. Ohmes. *Face to Face with an Orchestra: A Handbook for Choral Conductors Performing Handel's Messiah, Bach's Magnificat, Vivaldi's Gloria, and Other Works* (United States: Prestige Publications, 1987), 27.

Unlike the sources from the mid-to-late 1900s, which predominantly contain initial observations of the phenomenon rather than reasons and solutions, sources from the last twenty years look more deeply and critically into the causes, and offer possible conducting solutions for dealing with it. The Grove Music Online is one of such sources: it includes an extensive article on conducting published in 2001. It contains several different sections written by a number of scholars: including John Spitzer, Neal Zaslaw, Leon Botstein, Charles Barber, José A. Bowen, and Jack Westrup. The behind-the-beat playing phenomenon is discussed under the section titled “(iv) The beat: tactus and ictus,” by Charles Barber. Barber writes that “there is one geographic distinction in the placing of pulse.”²⁷ In addition, Barber writes that behind-the-beat playing is “most often used in slower music of an elevated lyricism, where the early-warning apparatus of the conductor's gestures can provide a remarkable flexibility, rubato and shapeliness of line.”²⁸ According to Barber, conductors such as “Furtwängler, Klemperer, Knappertsbusch, Talich, Karajan, Carlos Kleiber and Maazel have been among the masters of this special technique.”²⁹

Jean Ashworth Bartle, in *Sound Advice: Becoming a Better Children's Choir Conductor* published in 2003, instructs choir conductors in working with an orchestra to “tell the players whether they play on the stick or behind the stick

²⁷ Spitzer et al., “Conducting,” 17.

²⁸ Spitzer et al., 17.

²⁹ Spitzer et al., 17.

and on the top of the beat or at the bottom of the beat."³⁰ She goes on to explain the behind-the-beat playing evidenced in great European orchestras:

Most often instrumentalists play on the stick at the bottom of the beat. (Many great European orchestras are now playing behind the stick. It apparently gives the players a greater sense of momentum and a split second to plan and execute what they are going to do.) Orchestral musicians want clarity from the beat, but it is not necessary to overbeat or use the baton as a whip! Too much beating often results in difficulties for the players, since the natural delay of orchestral attacks (that subtle lag between baton and orchestra) is inherent in the players' listening to one another. If the baton is too insistently beaten, the musicians will not know whether to follow the orchestra ensemble or the baton, which may be milliseconds earlier. 'Let the orchestra play' is a useful concept as long as the work is progressing according to the conductor's vision.³¹

According to Bartle, the delay of orchestral attacks is a natural phenomenon.

Especially in more experienced orchestras, trying to be clear by "too much beating"³² causes a disturbance to the natural flow of the musicians.

In *The Cambridge Companion to Conducting*, "The Orchestra Speaks," Robert L. Ripley, a cellist of the Boston Symphony Orchestra for over forty years also discusses the behind-the-beat playing phenomenon. Ripley writes about the phenomenon from his own experience. Referring to the behind-the-beat playing as a "delayed response": "You give a good hefty downbeat and... nothing happens! In a split second, you say to yourself, 'What's wrong?!' Then you hear it; the chord is late. But why? You start the next chord and the same thing

³⁰ Jean Ashworth Bartle, *Sound Advice: Becoming a Better Children's Choir Conductor* (United Kingdom: Oxford University Press, 2003), 101.

³¹ Bartle, *Sound Advice*, 101.

³² Bartle, 101.

happens."³³ To explain further, Ripley shares the following anecdote which describes how he came to learn about behind-the-beat playing:

It is uncanny, but it works. They all play exactly together. To you, the young conductor, they are late. To them, they are right on time. I learned the lesson of the delayed response when I joined the Cleveland orchestra after World War Two, in the first season of George Szell's tenure. He opened his first rehearsal with the Beethoven "Eroica." I was eager to do everything just right, and was nervous. I had heard of Szell's reputation as a taskmaster, so when the downbeat came, I played exactly with it - all by myself. I thought he surely heard it, along with the whole orchestra. Needless to say, I never made that mistake again.³⁴

Ripley's anecdote accurately describes the behind-the-beat phenomenon. He compares this phenomenon to a freight train as he writes: "To a conductor, a major orchestra is like a freight train. It has to be cajoled and pulled along. Once it gets going, things go more easily; but there is always this bit of lag."³⁵

One of the most insightful and informative sources on behind-the-beat playing appears in *Inside Conducting*. In this book, Seaman shares anecdotes and insights on his work at "both ends of the baton" (as a timpanist and a conductor).³⁶ Seaman writes that he is "often asked why orchestras play behind the conductor's beat."³⁷ "The effect," he adds, "is puzzling for audiences and a nightmare for inexperienced conductors."³⁸ Similarly to Seidl and Schmid,

³³ Robert L. Ripley, "The Orchestra Speaks," in *The Cambridge Companion to Conducting*, ed. José Antonio Bowen (Cambridge: Cambridge University Press, 2003), 79.

³⁴ Ripley, "The Orchestra Speaks," 79.

³⁵ Ripley, 79.

³⁶ Seaman, *Inside Conducting*.

³⁷ Seaman, 79.

³⁸ Seaman, 79.

Seaman recommends avoiding the “time-beating” style of conducting.³⁹

An interesting discussion related to behind-the-beat playing appears in *Beyond the Score: Music as Performance*. In this book, Nicholas Cook discusses the inverse relationship between a clean/decisive beat and a tighter ensemble. As Seidl and Schmid’s quotes from the introduction suggest,⁴⁰ sharper and cleaner beating is not the pathway to great music making. Cook confirms the presence of the behind-the-beat playing phenomenon, while discussing Phillip Murray Dineen’s observational study of “the interactive nature of gesture through analysis of the relationship between the conductor and the orchestra.”⁴¹ Dineen is a professor in the School of Music at the University of Ottawa. His research covers many topics, including the relationship between music and ethics, and Schoenberg’s theories of harmony. In his interdisciplinary research from 2011 titled “Gestural Economies in Conducting,” Dineen explores the “links between musical gestures and other human pursuits in the detailed cross-comparison of conducting and ice hockey.”⁴² He states that there is “an evident delay or lag in some orchestras, a brief moment between the conductor’s gesture and the sound it elicits.”⁴³

The final entry in this overview of scholarship, as opposed to popular

³⁹ Schmid, *The Language of the Baton*, 3; Seidl, *On Conducting*, 2.

⁴⁰ Schmid, *The Language of the Baton*, 3; Seidl, *On Conducting*, 2.

⁴¹ Phillip Murray Dineen, "Gestural Economies in Conducting," in *New Perspectives on Music and Gesture*, ed. Anthony Gritten and Elaine King (Burlington, Vt.: Ashgate, 2011), 4.

⁴² Dineen, "Gestural Economies in Conducting," 4.

⁴³ Cook, *Beyond the Score: Music as Performance*, 270.

sources, is Diane Wittry's *Baton Basics: Communicating Music Through Gestures*. In *Baton Basics*, Wittry informs conductors about behind-the-beat playing under the section titled, "The Delay."⁴⁴ She states that "for a beginning conductor, one of the hardest things to become accustomed to is that the sound from your ensemble will always seem a fraction behind the actual impact of your gesture."⁴⁵ According to Wittry, the delay is a result of the response time necessary for a large group to react to your motion.⁴⁶ Additionally, she reiterates the idea found in Barber's article from the Grove's, which attributes the delay to stylistic distinctions according to geography.⁴⁷

In the last five-to-six years, several popular music websites and music magazines also featured articles on behind-the-beat playing. These publications show not only the prevalence of behind-the-beat playing in professional orchestras, but also its universal recognition by the interested and curious general public. The first of such publications is from *The Strad*, a UK-based monthly classical music magazine about string instruments for amateur and professional musicians. The 2014 article by Evan Johnson titled "Why do so many orchestras lag behind the beat?" discusses the behind-the-beat playing phenomenon as a conundrum. Johnson found that even under the leadership of the best conductors in the world, and in the finest orchestras, players tend to

⁴⁴ Diane Wittry, *Baton Basics: Communicating Music through Gestures* (New York: Oxford University Press, 2014), 188.

⁴⁵ Wittry, *Baton Basics*, 188.

⁴⁶ Wittry, 188.

⁴⁷ Wittry, 188.

drag and be behind the baton.⁴⁸ Johnson writes that “Conductors often urge orchestras not to play behind their beat, but players, though they may respond by looking more attentive, often continue to lag.”⁴⁹ Johnson adds that “Some conductors interpret this as incompetence or insubordination, yet it happens in the finest orchestras, some of which even have reputations for playing far behind the beat.”⁵⁰ About the amount of the delay, Johnson writes that “the amount of lag varies in different situations, but the tendency is universal.”⁵¹ He adds that this tendency is “seldom satisfactorily analyzed or addressed.”⁵² According to Johnson, orchestras are often late to play on the beat even though they have the preparatory gesture.⁵³ Another explanation for the lag is that the sound produced by instruments at the back of an orchestra takes longer to reach the front.⁵⁴ The shape or style of a conductor’s beat is also a factor; as Johnson writes, “the haphazard gestures of some conductors defy precise readings.”⁵⁵ Yet another possible reason for behind-the-beat playing is the musicians’ natural “instinct for good ensemble,” which is connected to their “desire for comfort and safety.”⁵⁶ This, in other words, is the common desire for musicians in ensembles to stay together. Johnson reports that “safety in a group may explain why the sound

⁴⁸ Evan Johnson, “Why do so many orchestras lag behind the beat?,” *The Strad*, August 28, 2014.

⁴⁹ Johnson, “Why do so many orchestras lag”.

⁵⁰ Johnson, “Why do so many orchestras lag”.

⁵¹ Johnson, “Why do so many orchestras lag”.

⁵² Johnson, “Why do so many orchestras lag”.

⁵³ Johnson, “Why do so many orchestras lag”.

⁵⁴ Johnson, “Why do so many orchestras lag”.

⁵⁵ Johnson, “Why do so many orchestras lag”.

⁵⁶ Johnson, “Why do so many orchestras lag”.

starts off behind the stick.”⁵⁷ Furthermore, there is a correlation between the delay and the tempo and style of the music. Johnson writes: “Players need to sense the edge of the group sound before completely committing their own. This may mean the merest fraction of time when the music is fast and vigorous, or an appalling delay when it is slow or delicate.”⁵⁸ Johnson also states that “Players may feel even safer when they perceive the conductor's intent a little before they perceive the group's intent - when they can examine the beat for a moment before reproducing it.”⁵⁹ Thus, playing after perceiving the intent of the conductor and the group provides individual players even more protection from the possible embarrassment from discordance.⁶⁰

The second article that discusses the behind-the-beat playing phenomenon is from the *WQXR* website. *WQXR* is New York City’s only classical music radio station, broadcasting live on 105.9 FM.⁶¹ In a 2017 article, titled “Why do orchestras seem to play behind the beat?” James Bennett shares his findings on the behind-the-beat playing phenomenon, as well as his interview on the topic with JoAnn Falletta, the Music Director of the Buffalo Philharmonic. According to Bennett, Falletta’s response, simply put, is that “When an orchestra plays behind the conductor, it has the room to produce a more expressive

⁵⁷ Johnson, “Why do so many orchestras lag”.

⁵⁸ Johnson, “Why do so many orchestras lag”.

⁵⁹ Johnson, “Why do so many orchestras lag”.

⁶⁰ Johnson, “Why do so many orchestras lag”.

⁶¹ James Bennett, “Why do orchestras seem to play behind the beat?,” *WQXR Blog*, September 17, 2017.

sound."⁶² Falletta explains that in her experience, behind-the-beat playing is effective because “musicians can take in a great deal more information before they play.”⁶³ She adds: “It gives them a chance to prepare that sound. So the downbeat comes, and the sound opens after that.”⁶⁴ Falletta also attributes behind-the-beat playing to a learned behavior by the experienced orchestra players who have been playing together for a long time.⁶⁵ In Bennett’s interview, Falletta shares her experience of having a new player join her orchestra: “I know that when we have a new player who comes right out of conservatory, in that first rehearsal, they are the first ones to come in on that first note — because they aren’t used to [the delay].”⁶⁶ Bennett claims that whatever the reason may be, “lagging behind yields great success on stage.”⁶⁷ Falletta remains fascinated by the behind-the-beat phenomenon: “The orchestras that have played together for some time just know how to do it. It’s very mysterious ... I’ve seen European orchestras respond so far after the beat, that I have no idea how they know exactly where to place that.”⁶⁸

The last article is from *Classic FM’s* website: one of the United Kingdom’s three Independent National Radio stations. In the 2017 article titled, “Why do conductors always conduct ahead of the beat?” author Maddy Shaw Roberts

⁶² Bennett, “Why do orchestras”.

⁶³ Bennett, “Why do orchestras”.

⁶⁴ Bennett, “Why do orchestras”.

⁶⁵ Bennett, “Why do orchestras”.

⁶⁶ Bennett, “Why do orchestras”.

⁶⁷ Bennett, “Why do orchestras”.

⁶⁸ Bennett, “Why do orchestras”.

also acknowledges that the behind-the-beat playing phenomenon exists in professional orchestras.⁶⁹ In Roberts' view, behind the beat playing is not the result of the orchestra being late, but rather, the conductor being early.⁷⁰ Roberts says that this is a "fairly standard practice among professional conductors."⁷¹ "The most common argument for this practice," Robert states, "is that it gives conductors the chance to let the musicians know what's going to happen next."⁷² According to Roberts "the conductor always places their downbeat just before the musicians need to play their note."⁷³ In the article, Roberts raises a question about other variables that could possibly negate this relationship. She asks: "If this were true, why wouldn't it be the same for amateur orchestras? Yet amateur orchestra conductors tend more typically to conduct on the beat, to act as a clear metronome for the musicians."⁷⁴ This is a great point, which this project investigates further in the later chapters.

According to over seventy sources on conducting consulted for this project, the consensus on the premise for behind-the-beat playing is that it promotes a warmer and more expressive sound. In all respects, behind-the-beat playing is a "type of mature musicianship [which] can produce a special quality."⁷⁵ On the contrary, "on-the-beat (ictus) playing will give too 'clinical' a sound,"

⁶⁹ Maddy Shaw Roberts, "Why do conductors always conduct ahead of the beat?," *ClassicFm*, October 6, 2017.

⁷⁰ Roberts, "Why do conductors".

⁷¹ Roberts, "Why do conductors".

⁷² Roberts, "Why do conductors".

⁷³ Roberts, "Why do conductors".

⁷⁴ Roberts, "Why do conductors".

⁷⁵ Atherton, *Vertical Plane Focal Point Conducting*, 38.

especially in “passages of great warmth of expression.”⁷⁶ Seaman claims that the best orchestras have “developed a habit of playing slightly late, because it can produce a more beautiful sound than playing clinically together with a clear beat.”⁷⁷ Claudio Abbado, says that “[the Vienna Philharmonic] never play exactly on the beat,” but rather, “they play after the beat, and that produces not a hard sound, but warmer.”⁷⁸ Seaman writes that one of the reasons for the benefits in the sound is because “the larger instruments, with their longer strings and tubes, need time to speak; otherwise an orchestra sounds top-heavy and lacking in depth.”⁷⁹ It may require a longer duration behind the beat until the orchestra sounds all together. This extra time allows for bigger instruments to have enough time to create a deep and beautiful sound. Falletta also explains that “when an orchestra plays behind the conductor, it has the room to produce a more expressive sound.”⁸⁰ Additional benefits of behind-the-beat playing are flow and flexibility, especially in lyrical passages or overall in romantic repertory.⁸¹ Barber conveys that this kind of playing is facilitated by what he describes as “[an] early-warning apparatus.”⁸² Barber’s description here, closely matches the aims of rebound-focused-conducting, which the following chapters advocate.

⁷⁶ Atherton, 38.

⁷⁷ Seaman, *Inside Conducting*, 79.

⁷⁸ Seaman, 79.

⁷⁹ Seaman, 79.

⁸⁰ Bennett, “Why do orchestras”.

⁸¹ Spitzer et al., “Conducting,” 17

⁸² Spitzer et al., 17.

Chapter 3: Shortcomings of Conducting Manuals

As claimed by Seaman in *Inside Conducting*, “Conducting is a relatively young art, and the teaching of it is even younger.”⁸³ Many conductors from the early years of the profession did not have conducting teachers, classes, or manuals. Ernest Ansermet, a Swiss conductor from the early 1900s, reports that “All the conductors of ... my generation, Furtwangler, Klemperer, Kleiber, and others, did not have lessons in conducting.”⁸⁴ According to Seaman, “at the beginning of the twentieth century, very few conservatories had conducting courses.”⁸⁵ On the validity of conducting pedagogy, he writes: “Some would say teaching conducting is a mistake, because if people haven’t been born with the right talent, they’ll never be any good. To put them through a course of training only means that a mass of mediocrity will be let loose on the world.”⁸⁶ Endorsing a similar stance, British conductor John Barbirolli claims that “teaching people to conduct [is] ‘dishonest,’” while “Otto Klemperer describes conducting lessons as ‘nonsense.’”⁸⁷

Hermann Scherchen, a German conductor and conducting teacher, who wrote several books including “*Lehrbuch des Dirigierens* (1929; Eng. trans.,

⁸³ Seaman, *Inside Conducting*, 15.

⁸⁴ Seaman, 20.

⁸⁵ Seaman, 16.

⁸⁶ Seaman, 16.

⁸⁷ Seaman, 16.

1933, as *Handbook of Conducting*), *Vom Wesen der Musik* (1946; Eng. trans., 1950, as *The Nature of Music*), and *Musik für Jedermann* (1950; *Music for Everyman*),”⁸⁸ contradicts the naysayers of the pedagogy of conducting. He argues that “a technique of conducting does exist, and can be learnt [*sic*] and practised [*sic*] down to its smallest details before a student first attempts to conduct an orchestra.”⁸⁹ Scherchen states: “When a student confronts an orchestra for the first time, he must have thoroughly mastered the practice of his craft. He must be not merely theoretically able to conduct an orchestra, but actually capable of dealing with the realities of the orchestra.”⁹⁰ Although an ideal goal for a conducting teacher to instill in a student, conducting is best learned and improved by actually conducting an orchestra. “If you are an aspiring conductor,” Seaman remarks, “there’s no substitute for regular hands-on experience.”⁹¹ Elizabeth Green and Nicolai Malko also assert the importance of experience practicing the craft by likening it to driving a car:

Learning to conduct is like learning to drive a car. The driver learns how to start and stop the motion, how to speed up and slow down the motion, how to turn the corners, always keeping the machine under control. In the teaching-learning process, the young conductor needs first to acquire the feeling of handling his "machine."⁹²

Needless to say, a great conductor cannot be simply born, as a solely theoretically-trained conductor cannot master the interactive art of this craft. Max

⁸⁸ Gerhard Brunner, "Scherchen, Hermann," *Grove Music Online*, 2001, <https://doi-org.ezproxy.uky.edu/10.1093/gmo/9781561592630.article.24807>.

⁸⁹ Hermann Scherchen, *Handbook of Conducting* (New York: Oxford University Press, 1989), 4.

⁹⁰ Scherchen, *Handbook of Conducting*, 4.

⁹¹ Seaman, *Inside Conducting*, 16.

⁹² Elizabeth A. H. Green and Nicolai Malko, *The Conductor and His Score* (Englewood Cliffs, N.J.: Prentice-Hall, 1975), 126.

Rudolf makes an apt analogy that substantiates this concept: “When speaking of a ‘born surgeon,’ no one would suggest that a medical person, no matter how brilliant, should take charge of an operation unless he was thoroughly trained in the theory and practice of his craft.”⁹³

Regardless of how young the art or how controversial the validity of its pedagogy, creating a textbook for something as intuitive and internal as conducting has its challenges. As Robert Ripley remarks, “the better a conductor is, the less you know why.”⁹⁴ Although rudimentary ideas and instructions may be successfully transmitted to words on paper, more in depth ideas and concepts beyond the basics seldom appear in conducting manuals. From the point of view of a student learning to become a conductor, the conducting manuals lack directions on growth and development from a rudimentary conductor to one more mature, expressive and artistic. In this regard, most conducting manuals lack instructions on the behind-the-beat playing. Seaman states the following observation about the process of learning to conduct:

Most conductors start by learning a basic way of beating, then adapt or abandon it with experience. Their styles vary widely, because they've developed them in different ways. A strict textbook style inhibits our artistry and self-expression, although it was necessary while we were finding our feet. In our own way, we begin by conducting the beats and end up conducting the music.⁹⁵

The premise of behind-the-beat playing is that the sound happens behind the

⁹³ Seaman, *Inside Conducting*, 20.

⁹⁴ Seaman, 15.

⁹⁵ Seaman, 66.

beat; after the ictus gesture of the conductor. However, most conducting manuals instruct that the ictus is the moment when the sound actually happens and should happen. This describes ictus-focused-conducting, where conductors expect the sound to arrive on-the-beat (on the ictus). Ictus-focused-conducting is overly concerned about the synchrony of sound with a precise, designated point. Although it is not entirely incorrect, this is a rudimentary and theoretical understanding that limits conductors early on and prevents them from evolving beyond this level.

The discrepancy between textbook instructions and what actually happens in real life presents a serious conundrum for many conductors, both young and experienced. Wittry, in *Baton Basics* remarks that “for a beginning conductor, one of the hardest things to become accustomed to is that the sound from your ensemble will always seem a fraction behind the actual impact of your gesture.”⁹⁶ Seaman corroborates this notion, saying that “young conductors often feel totally thrown by this delay.”⁹⁷ Seaman also shares that behind-the-beat playing is “puzzling for audiences and a nightmare for inexperienced conductors.”⁹⁸ Likewise, Don V Moses et al. in *Face to Face with an Orchestra* comment that “The most frequent complaint young conductors make about orchestra [is] that they respond late”⁹⁹ Wittry recommends that conductors experiencing difficulty

⁹⁶ Wittry, *Baton Basics*, 188.

⁹⁷ Seaman, *Inside Conducting*, 79.

⁹⁸ Seaman, 79.

⁹⁹ Demaree, Moses, and Ohmes, *Face to Face with an Orchestra*, 27.

with an orchestra's behind-the-beat playing should "not react to the delayed sound, or in any way slow down your gestures to 'be with the ensemble.'"¹⁰⁰ She advises conductors to "instead, always conduct slightly ahead of the sound you are hearing, and continuously lead the group." According to Wittry, this is a common phenomenon of conductors, usually in their first conducting experiences.¹⁰¹ She cautions that this will be difficult at first, "but eventually you will master it."¹⁰²

Unfortunately, contrary to Wittry's encouragement, conducting an orchestra that plays behind-the-beat is not a dilemma that solely troubles a beginner or a young and inexperienced conductor; it also vexes plenty of skilled and experienced professional conductors. In "Why do so many orchestras lag behind the beat?" Johnson writes that "Skilful [*sic*] conductors learn to manipulate their orchestras to get most of what they want, but the lag phenomenon can be frustrating."¹⁰³ Here, Johnson's reference to the "lag phenomenon" is synonymous with behind-the-beat playing. According to Johnson, "a conductor may be unable to make delicate tempo adjustments or phrasing nuances if the sound is not reliably aligned with the stick."¹⁰⁴ He adds that "players who wish to follow a conductor carefully are often thwarted by the unyielding momentum of

¹⁰⁰ Wittry, *Baton Basics*, 188.

¹⁰¹ Wittry, 188.

¹⁰² Wittry, 188.

¹⁰³ Johnson, "Why so many orchestras lag".

¹⁰⁴ Johnson, "Why so many orchestras lag".

the group.”¹⁰⁵ Furthermore, Wittry admonishes that conductors who fail to adjust to the “behind-the-beat” playing will cause the orchestra to unintentionally slow down, lose interest, and consequently make no “real music”¹⁰⁶

The contradiction lies in when the conductor is supposed to expect the sound. In contrast to behind-the-beat playing, which claims that the sound response happens after the ictus, most conducting manuals state that the sound response happens on the beat or on the ictus. They often emphasize precision and exactness in their definitions. For example, in his conducting technique textbook published in 1966, McElheran writes: “The first beat is shown by a downward motion which is vertical and which ‘bounces’ at the bottom. The instant in which it stops falling and starts to rise is the moment known as ‘one.’”¹⁰⁷ What McElheran describes here is accurate with respect to the ictus and presents no contradiction with behind-the-beat playing. However, in the next quote he writes that “performers must be trained to play exactly at the bottom of the beat.”¹⁰⁸ McElheran’s remark here is valid only at a rudimentary level, and even then, only theoretically. Donald Hunsberger and Roy Ernst in *The Art of Conducting* also instruct conductors that “the precise moment when the metric pulse is felt and the tone begins is called the ictus.”¹⁰⁹ Similarly, in *Vertical Plane Focal Point Conducting* from 1989, Leonard Atherton writes that an ictus is “the

¹⁰⁵ Johnson, “Why so many orchestras lag”.

¹⁰⁶ Wittry, *Baton Basics*, 188.

¹⁰⁷ McElheran, *Conducting Technique for Beginners and Professionals*, 19.

¹⁰⁸ McElheran, 19.

¹⁰⁹ Donald Hunsberger and Roy E. Ernst, *The Art of Conducting* (New York: Knopf: Random House, 1983), 5.

point at which the precise beginning of a beat is marked.”¹¹⁰ Atherton adds that “it is the moment when the ensemble ‘sounds.’”¹¹¹ Furthermore, *The Complete Conductor* from 1995 describes the ictus as the moment when the ensemble sounds:

The attack of your ensemble should occur at the precise moment when your beat touches the bottom of the frame, ending the beat-stroke. This moment must dovetail with the matrix in your mind so that you expect to hear that attack match exactly the arrival of your hand at the point of the beat. If you and your musicians are not precise about this, your ensemble will lead or trail you, and you gradually will lose your ability to get them to follow the baton.¹¹²

Later chapters of this paper further discuss and argue that this kind of playing is only applicable in a theoretical setting. In reality this kind of exactitude does not occur, and it is entirely contradictory to the concept of behind-the-beat playing.

Many more conducting manuals emphasize precision and exactness in their definitions of the ictus, which oppose the concept of “behind-the-beat” playing. In *The Teacher on the Podium*, John Kinyon writes that “the tip of the baton should ‘touch’ the imaginary base line at the exact time-point of each beat.”¹¹³ In *The Modern Conductor* Elizabeth Green writes that the ictus is “[an]

¹¹⁰ Atherton, *Vertical Plane Focal Point Conducting*, 2.

¹¹¹ Atherton, 2.

¹¹² Robert W. Demaree and Don V. Moses, *The Complete Conductor : A Comprehensive Resource for the Professional Conductor of the Twenty-first Century* (Englewood Cliffs, N.J.: Prentice-Hall, 1994), 27.

¹¹³ John Kinyon, *The Teacher on the Podium: A Source Book of Basic Conducting Skills and Teaching Concepts for Instrumental Music Teachers* (Port Washington, N.Y.: Alfred Pub., 1975), 15.

indication of the precise instant of the rhythmic pulse.”¹¹⁴ Additionally, in *Basic Conducting Techniques* from 2009, Joseph A. Labuta says that the ictus is a “point of beat” or “clear beats defined by wrist action.”¹¹⁵ In reality, playing exactly with the beat implies that the ictus is anticipated. If this is true, then what orchestras do would have to be phrased ‘anticipating the conductor,’ and not ‘following the conductor.’ As evidenced by examples from numerous conducting manuals, their rudimentary and rather clinical concept of the ictus causes many conductors to become, as Seidl and Schmid claim in the introduction, a “time-beater.”¹¹⁶

¹¹⁴ Elizabeth Green, *The Modern Conductor : A College Text on Conducting Based on the Technical Principles of Nicolai Malko as Set Forth in His The Conductor and His Baton* (Upper Saddle River, N.J.: Prentice Hall, 1997), 59.

¹¹⁵ Joseph A. Labuta, *Basic Conducting Techniques* (Upper Saddle River, N.J.: Pearson/Prentice Hall, 2004).

¹¹⁶ Schmid, *The Language of the Baton*, 3; Seidl, *On Conducting*, 2.

Chapter 4: The Empirical Studies

In addition to the increased number of books in the last twenty years that discuss behind-the-beat playing, a number of empirical studies and interdisciplinary research from recent years also examine different facets of this topic. Related fields include musical cognition and context, music and neurological studies through social psychology, psychobiology of musical gestures, and human movement studies. A great resource published in 2011 titled *New Perspectives on Music and Gesture* contains a number of such studies including, “Psychobiology of Musical Gesture: Innate Rhythm, Harmony and Melody in Movements of Narration” by Colwyn Trevarthen, Jonathan Delafield-Butt and Benjamin Schögler; “Gestures in Music-making: Action, Information and Perception” by W. Luke Windsor; the aforementioned “Gestural Economies in Conducting” by Phillip Murray Dineen; “Computational Analysis of Conductors’ Temporal Gestures” by Geoff Luck; and “Gestures and Glances: Interactions in Ensemble Rehearsal” by Elaine King and Jane Ginsborg.¹¹⁷

Of the various studies, four by Geoff Luck stand out as being most directly pertinent to the current examination of the behind-the-beat playing phenomenon. Luck, an Academy of Finland Research Fellow in the music department of the

¹¹⁷ Anthony Gritten and Elaine King, ed., *New Perspectives on Music and Gesture* (Burlington, Vt.: Ashgate, 2011).

University of Jyväskylä, with a background in music psychology and movement analysis, is one of the leading researchers in interdisciplinary music research focusing on kinematics and dynamic aspects of musical communication. His work includes extensive study on temporal and expressive aspects of conducting gestures, synchronization processes, movement therapy, and listeners' spontaneous movements to music. Luck's findings in the following four studies validate the claim that behind-the-beat playing is universal and support the advocacy for rebound-focused-conducting over ictus-focused-conducting.

In his paper "Synchronising a Motor Response with a Visual Event: The Perception of Temporal Information in a Conductor's Gestures" from 2000, Luck shares the findings from his study, where he measured the response rates of thirty-two participants with varying musical experience to a conductor's gesture. In this study, the participants watched a sequence of video clips showing a conductor beating at varying tempi. Two versions of the clip were used: 1. Full-cue version - showing the full image of the conductor, and 2. Baton-only version - showing only the movements of the baton, with the conductor's limbs digitally removed.¹¹⁸ The participants were required to press the left mouse button in time with the conductor's demarcation of the beat, as if they were using the mouse to play a note on each beat.¹¹⁹ Findings from the study prove the claim that behind-

¹¹⁸ Geoff Luck, "Synchronising a Motor Response with a Visual Event: The Perception of Temporal Information in a Conductor's Gestures" (Keele, Staffordshire, UK: Department of Psychology, 2000).

¹¹⁹ Luck, "Synchronising a Motor Response with a Visual Event".

the-beat playing is universally a general tendency.¹²⁰ The response of participants in both the full-cue and the baton-only conditions reveal a tendency to be late, with an average delay of 84.67 milliseconds in the full-cue condition, and 82 milliseconds in the baton-only condition. The results show that participants in the full-cue condition did not perform as well in synchronizing with the conductor's beat than participants in the baton-only condition.¹²¹ Additionally, the participants' amount of experience working with a conductor was negatively correlated to the level of synchronization with the conductor's beat: Participants with more experience were significantly less accurate in aligning with the beat. Luck writes that this tendency arises from experience playing in ensembles, "where it is discovered that 'playing late' is the safer option if you are not sure about the placement, or quality, of your entry."¹²² He suggests that "musicians favour a *late* response over an *early* one, resulting in responses which 'drag' behind the stimulus."¹²³ According to Luck, "both Boult and McElheran advocate the use of smooth and predictable gestures to help players more accurately predict the position of the next beat, and also, 'feel where they are' between the beats."¹²⁴ This supports the argument for rebound-focused-conducting over ictus-focused-conducting.

In an effort to "systematically investigate conductors' gestures and

¹²⁰ Luck, "Synchronising a Motor Response with a Visual Event".

¹²¹ Luck, "Synchronising a Motor Response with a Visual Event".

¹²² Luck, "Synchronising a Motor Response with a Visual Event".

¹²³ Luck, "Synchronising a Motor Response with a Visual Event".

¹²⁴ Luck, "Synchronising a Motor Response with a Visual Event".

musicians' performance in a real-world setting,"¹²⁵ Luck and Petri Toiviainen's "Ensemble Musicians' Synchronization with Conductors' Gestures" from 2006, examines conductor-musician synchronization with an actual conductor, and an ensemble of twenty-six Sibelius Academy orchestral musicians and sixteen choral singers. The study used a three-camera optical motion-capture system to record the gestures of the conductor directing the ensemble and choir through four excerpts from Mozart's *Requiem*. Then, from the video, twelve movement variables were computationally extracted: "x, y, z (position; in this case x = left-right, y = up-down, and z = forward-backward); v_x , v_y , v_z (velocity components); a_x , a_y , a_z (acceleration components); v (speed); a (magnitude of acceleration); and a_t (magnitude of acceleration along the movement trajectory)."¹²⁶ After that, the collected data was cross-correlated with the pulse of the ensemble's performance.¹²⁷ Luck and Toiviainen report that "the results of this study also support the idea that the ensemble tends to lag behind the conductor somewhat."¹²⁸ In all different manipulations of the twelve movement variables, the lag was consistently present: from 30 milliseconds to 430 milliseconds. Additional findings reveal that "the conductor's hand was moving in a fast upward direction, and away from the generally regarded location of 'the beat,' when the ensemble played."¹²⁹ This is evidence that the actual moment the musicians tend

¹²⁵ Geoff Luck and Petri Toiviainen, "Ensemble Musicians' Synchronization with Conductors' Gestures: An Automated Feature-Extraction Analysis," *Music Perception* 24, no. 2 (12, 2006): 189. <http://ezproxy.uky.edu/login?url=https://search-proquest-com.ezproxy.uky.edu/docview/1366783?accountid=11836>.

¹²⁶ Luck and Toiviainen, "Ensemble Musicians' Synchronization," 192.

¹²⁷ Luck and Toiviainen, 189.

¹²⁸ Luck and Toiviainen, 196.

¹²⁹ Luck and Toiviainen, 196.

to organically produce the sound is not the point coming into the ictus, but rather, during the rebound after the ictus.

In 2008, Luck, together with John Sloboda, published “Exploring the Spatio-Temporal Properties of Simple Conducting Gestures Using a Synchronization Task.” In this study, Luck and Sloboda employ three experiments to investigate the properties of a conductor’s gestures that “induce the percept of a visual beat.”¹³⁰ In each experiment, “perception of the location of a visual beat was investigated by correlating participants’ synchronization responses with four spatio-temporal features of the stimulus motion: *instantaneous speed* [v], *acceleration along the trajectory* [a], *radius of curvature* [r], and *rate of change of radius of curvature* [r'].”¹³¹ The participants of the study were university undergraduates, whose previous musical experience ranged from no experience to final year music students. They were asked to “[synchronize] a tapping response with point-light stimuli derived from simple conducting gestures.”¹³² The experiment used a program called *Conductor* (in C++, specifically designed for this task), which also recorded the participants’ responses.¹³³ During the experiments, participants “registered their responses by tapping the space bar [*sic*] on a regular computer keyboard.”¹³⁴ The results from

¹³⁰ Geoff Luck and John A. Sloboda, "Exploring the Spatio-Temporal Properties of Simple Conducting Gestures using a Synchronization Task," *Music Perception* 25, no. 3 (02, 2008): 225. <http://ezproxy.uky.edu/login?url=https://search-proquest-com.ezproxy.uky.edu/docview/1368882?accountid=11836>.

¹³¹ Luck and Sloboda, "Exploring the Spatio-Temporal Properties," 227.

¹³² Luck and Sloboda, 237.

¹³³ Luck and Sloboda, 228.

¹³⁴ Luck and Sloboda, 228-229.

the first experiment, “in which participants synchronized with the original gestures, indicated that beat induction was related to periods of negative acceleration (deceleration) and periods of high speed.”¹³⁵ In addition, “synchronizations were positively associated with periods of high acceleration and deceleration.”¹³⁶ In the second experiment, the curvature of the gesture was held constant. The findings revealed similar results from the first experiment where beat induction was “associated with periods of acceleration and deceleration, but even more strongly associated with particularly high levels of v (instantaneous speed).”¹³⁷ Finally the third experiment, in which the speed of the gesture was held constant, found that “Changes in direction of movement, and/or rate of change of direction, were not responsible for the induction of a visual beat.”¹³⁸

In describing the theoretical instructions on the ictus, Luck and Sloboda remark that “Many conducting texts speak of a ‘flick of the wrist’ to indicate the ‘precise location of the beat,’ which is rather vague, and does not really help in defining the beat in more exact terms.”¹³⁹ Results from this empirical analysis “revealed that certain aspects of the material contained within conducting manuals are erroneous.”¹⁴⁰ According to Luck and Sloboda, this is because

¹³⁵ Luck and Sloboda, 237.

¹³⁶ Luck and Sloboda, 237.

¹³⁷ Luck and Sloboda, 237.

¹³⁸ Luck and Sloboda, 237.

¹³⁹ Luck and Sloboda, 226.

¹⁴⁰ Luck and Sloboda, 238.

“Such manuals suggest that the beat is characterized by movements that do not conform to the kinematics of biological motion.”¹⁴¹ This study confirms that “the gestures made by conductors do indeed conform to descriptions in the biological motion literature, not those contained in conducting manuals.”¹⁴² Conducting manuals often merely “include written descriptions and static diagrams” with respect to “the features of a conducting gesture that induce the perception of a beat.”¹⁴³ However, results from the study reveal that “a visual beat is communicated by periods of acceleration or deceleration.”¹⁴⁴ The results “[support] the theory that the percept of a visual beat is created by a variable which reflects a change in the value of one of the parameters that defines a movement’s trajectory.”¹⁴⁵ Luck and Sloboda report that, although far outweighed by those that do not, there are “texts that do speak more about changes in speed (and a very clear example is the Prausnitz, 1983, book).”¹⁴⁶ These texts “clearly indicate greatest speed as occurring at the instant of the beat.”¹⁴⁷ However, Luck and Sloboda suggest that according to the characteristics of human movement, this description may also be inaccurate.¹⁴⁸ They write that this is because “in human movement, a change in direction is accompanied by a reduction in speed.”¹⁴⁹ The findings from this study support the concept outlined in the

¹⁴¹ Luck and Sloboda, 238.

¹⁴² Luck and Sloboda, 238.

¹⁴³ Luck and Sloboda, 226.

¹⁴⁴ Luck and Sloboda, 237.

¹⁴⁵ Luck and Sloboda, 237.

¹⁴⁶ Luck and Sloboda, “Exploring the Spatio-Temporal Properties,” 226; Frederik Prausnitz, *Score and podium: a complete guide to conducting* (New York: W. W. Norton, 1983).

¹⁴⁷ Luck and Sloboda, “Exploring the Spatio-Temporal Properties,” 227.

¹⁴⁸ Luck and Sloboda, 227.

¹⁴⁹ Luck and Sloboda, 227.

Japanese conductor Hideo Saito's *The Saito Conducting Method*. In this method, Saito also highlights the importance of the "control of acceleration and deceleration in the conducting motion."¹⁵⁰

In the 2009 published "Spatio-temporal Cues for Visually Mediated Synchronization," Luck and Sloboda further investigate the cues for conductor-musician synchronization. In this study, they examine synchronization with extended sequences of beats, rather than with a single beat, as in the previous study. The participants in the study were twenty-four university undergraduates with varying musical experience (from none to final year music students). The stimuli were produced by a twenty-eight-year-old orchestral, choral, and band conductor who had four years of conducting experience. A reflective marker was attached to the conductor's fingertip and this marker was tracked by an optical motion-capture system. The conductor produced nine gestures in combination of three levels of curvature (small, medium, or large), and tempo (slow, medium, or fast). The nine gestures were then analyzed using another specially written C++ program called *Analysis*.¹⁵¹ The results from this study also show that "cues for synchronization are more related to changes in speed along the trajectory of a gesture than to changes in direction."¹⁵² This corroborates the claim that

¹⁵⁰ Hideo Saito, *The Saito conducting method*, ed. Wayne J. Towes and trans. Fumihiko Torigai (Japan: Min-On Concert Association, 1988), 9.

¹⁵¹ Geoff Luck and John A. Sloboda, "Spatio-Temporal Cues for Visually Mediated Synchronization," *Music Perception* 26, no. 5 (06, 2009): 470. <http://ezproxy.uky.edu/login?url=https://search-proquest-com.ezproxy.uky.edu/docview/1368449?accountid=11836>.

¹⁵² Luck and Sloboda, "Spatio-Temporal Cues for Visually Mediated Synchronization," 470.

conducting manuals, which instruct sound alignment to be precisely with the bottom of the beat or on a specifically designated point (ictus), are “erroneous.”¹⁵³ Additionally, the study confirms that clarity of the beat and the tempo at which the gesture was given, affected the accuracy of synchronization: “the clearer the beat, and the faster the tempo, the better the cues for synchronization were identified.”¹⁵⁴

Additionally, the second part of Cory DeWitt Meals' three-part dissertation, “Questions of Gesture and Sound: Temporal Interactions in Conducted Ensembles A Multiple Study Dissertation” submitted in 2018, “investigates the nature of ensemble response to conductor gesture from a temporal perspective.”¹⁵⁵ In this section titled “A Question of Lag: The Relationship Between Conductor Gesture and Sonic Response in Instrumental Ensembles,” Meals explores the tendencies of sound offset from conductor gesture “between ensemble type (orchestra, wind band), ensemble experience level (beginner, intermediate, advanced), and development over time.”¹⁵⁶ Meals recorded audio and video of the six different instrumental ensembles (three wind bands and three orchestras) in rehearsal and performance. The ensembles consisted of two junior high school groups, one high school group and one university group. Each group served as “a proxy for the ensemble’s experience level” (beginner,

¹⁵³ Luck and Sloboda, “Exploring the Spatio-Temporal Properties,” 238.

¹⁵⁴ Luck and Sloboda, “Spatio-Temporal Cues for Visually Mediated Synchronization,” 470.

¹⁵⁵ Cory DeWitt Meals, “Questions of Gesture and Sound: Temporal Interactions in Conducted Ensembles A Multiple Study Dissertation” (Ph.D. diss., University of Washington, 2018), iv.

¹⁵⁶ Meals, “Questions of Gesture and Sound,” iv.

intermediate, and advanced).¹⁵⁷ The audio and video captures were then processed and analyzed using the software GarageBand and the *aubio* onset detection module in Python 3.4.1.¹⁵⁸ Meals' findings reveal a general tendency for orchestras to lag behind the conductor's gesture,¹⁵⁹ which confirms the claim that behind-the-beat playing is a natural and universal phenomenon displayed by orchestras. Meals reports that, contrary to orchestras which respond exclusively behind the conductor's gesture, "wind band phase values are roughly distributed between conductor- and ensemble-lead."¹⁶⁰ In other words, as Meals explains, the "temporal aspects of performance within wind bands [tend] to drift slightly ahead and behind the conductor's time."¹⁶¹ With regards to "Differences in offsets across experience levels and captures," the results only "[suggested] the possibility of an effect based on long-term ensemble experience."¹⁶² Meals states that "no clear linear relationship presents itself in the available data."¹⁶³ He writes: "this lag is dynamic and demonstrates change between ensembles, between experience levels, and over the course of a selected excerpt."¹⁶⁴ Meals' findings additionally associate "performance tempo and phrase structure as contributing factors in the variance observed."¹⁶⁵

¹⁵⁷ Meals, "Questions of Gesture and Sound," 66.

¹⁵⁸ Meals, "Questions of Gesture and Sound," 68.

¹⁵⁹ Meals, "Questions of Gesture and Sound," iv.

¹⁶⁰ Meals, "Questions of Gesture and Sound," 80.

¹⁶¹ Meals, "Questions of Gesture and Sound," 76.

¹⁶² Meals, "Questions of Gesture and Sound," 80.

¹⁶³ Meals, "Questions of Gesture and Sound," 80.

¹⁶⁴ Meals, "Questions of Gesture and Sound," iv.

¹⁶⁵ Meals, "Questions of Gesture and Sound," iv.

Chapter 5: The Argument for Rebound-focused-conducting

In “About the Handicraft of the Conductor” Wilhelm Furtwängler writes the following: “There is no art kept more secret than that of the real conductor. This is true not only for audience and critic, who are more or less dependent on general impressions, but also for the so-called ‘professionals,’ the conductors themselves.”¹⁶⁶ According to Furtwängler, the secret lies in the way Nikisch conducts. He writes that “Nikisch had precisely the capacity to make an orchestra sing.”¹⁶⁷ “This - and one may be certain of it -” he adds, “is a most uncommon talent.”¹⁶⁸ Furtwängler claims that the main problem in conducting is how the conductor can reconcile using mechanisms which are based on rhythmical points to compel an orchestra to sing.¹⁶⁹ Ictus-focused-conducting does not reconcile this dilemma, but rather emphasizes using what Furtwängler describes as, “[gestures] which [correspond] to the rhythm, to the point.”¹⁷⁰ Furtwängler writes that this kind of conducting, which focuses on these “points,” is the problem of all conducting.¹⁷¹ He confirms the fallacy of ictus-focused-conducting saying, “this point, this precision cannot be attained with an orchestra when one makes such a point in the air.”¹⁷²

¹⁶⁶ Carl Bamberger, *The Conductor's Art* (New York: McGraw-Hill, 1965), 206-207.

¹⁶⁷ Bamberger, *The Conductor's Art*, 210.

¹⁶⁸ Bamberger, 210.

¹⁶⁹ Bamberger, 210.

¹⁷⁰ Bamberger, 211.

¹⁷¹ Bamberger, 211.

¹⁷² Bamberger, 211.

In the following quote, Furtwängler again describes ictus-focused-conducting, warning conductors against this kind of music-making:

A point always remains a point; it is obvious that an orchestra which is conducted with points will also play with points, that is, everything rhythmical will be rendered with the required precision. But everything melodic, everything that lies between the individual beats (and that is sometimes quite a lot: one only has to remember the abundance of signs of expression, crescendo, and decrescendo which are so important in the works of some composers) will not be influenced. It is characteristic of such an interpretation - and this is frequently the case nowadays - that the rhythm, the meter come into their own, but not the music.¹⁷³

Focusing on the ictus as the precise moment when the sound should happen causes the conductor to emphasize the beats, thereby becoming a “time-beater.”¹⁷⁴ Ictus-focused-conducting is obtrusive to the natural flow and pulse of the orchestra. It also produces clinical and inexpressive music.¹⁷⁵ Rebound-focused-conducting is a solution to the essential issues Furtwängler advocates in conducting. In contrast to ictus-focused-conducting, rebound-focused-conducting focuses on the following rebound gesture. A conductor who focuses more on the rebound gesture is able to show smoother connections from one ictus to the next, and thereby allows the orchestra to flow organically from one beat to the next.¹⁷⁶ Consequently, rebound-focused-conducting encourages the orchestra to

¹⁷³ Bamberger, 211.

¹⁷⁴ Schmid, *The Language of the Baton*, 3; Seidl, *On Conducting*, 2.

¹⁷⁵ Leonard Atherton, *Vertical Plane Focal Point Conducting* (Muncie, Ind.: Ball State University, 1989), 38; Christopher Seaman, *Inside Conducting* (United Kingdom: University of Rochester Press, 2013), 66-72.

¹⁷⁶ Leonard Atherton, *Vertical Plane Focal Point Conducting* (Muncie, Ind.: Ball State University, 1989), 38; Nicholas Cook, *Beyond the Score: Music as Performance*, (United Kingdom: OUP USA, 2013), 270; Hideo Saito, *The Saito conducting method*, ed. Wayne J. Towes and trans.

find its own organic pulse, and to make a warm and beautiful sound. These resulting qualities all describe the positive effects of behind-the-beat playing.

In *Beyond the Score: Music as Performance* Cook reports the following:

According to Leslie Lewis, Valery Gergiev does not beat time clearly when performing standard repertory well known to the orchestra; this forces the musicians to listen to one another, and the result is a tighter ensemble than is achieved by student conductors whose beat, as conventionally assessed, is much clearer.¹⁷⁷

Valery Gergiev is one of the most popular and busiest conductors in the twenty-first century. As the popularity and the effectiveness of Gergiev's conducting reveal, beating time clearly does not yield the best results. As reported, Furtwängler was also "known for his unclear beat."¹⁷⁸ In describing his conducting technique, Hugh Bean, who was the concertmaster of The Philharmonia Orchestra in London from 1957 to 1967, says that the orchestra members likened Furtwängler to a "puppet on a string."¹⁷⁹ Also, Henry Holst, the Danish violinist who was the concertmaster of the Berlin Philharmonic Orchestra (1923-1931) under Furtwängler, describes that "His beat lacked that 'flick of decisiveness' that will enforce precision over an ensemble."¹⁸⁰ According to Holst, "that kind of precision he did not like at all."¹⁸¹ Instead, "[Furtwängler]

Fumihiko Torigai (Japan: Min-On Concert Association, 1988), 9; Christopher Seaman, *Inside Conducting* (United Kingdom: University of Rochester Press, 2013), 66-72.

¹⁷⁷ Cook, *Beyond the Score: Music as Performance*, (United Kingdom: OUP USA, 2013), 270.

¹⁷⁸ Cook, *Beyond the Score: Music as Performance*, 270.

¹⁷⁹ *The Art of Conducting: Great Conductors of the Past*, directed by Sue Knussen, (1994; Hamburg: Teldec Classics International), VHS.

¹⁸⁰ Cook, *Beyond the Score: Music as Performance*, 270.

¹⁸¹ Cook, 270.

wanted the precision that grew out of the orchestra, from the players' own initiative, as in chamber music."¹⁸² This is an accurate description of the argument for rebound-focused-conducting over ictus-focused-conducting. Instead of enforcing precision, as ictus-focused-conducting suggests, rebound-focused-conducting allows the precision to grow out of the orchestra.¹⁸³ Furtwängler supports this notion when he says that "There is no doubt that the sharp downbeat has its disadvantages': it results in 'a reduction of the expressive possibility that the living flow of the music demands.' "¹⁸⁴ Seaman states that "it's tempting to give a tight, sharp beat, just for the sake of being clear and getting people playing together"¹⁸⁵; this description conveys ictus focused conducting. Seaman comments that when conducted in this manner, "the musicians will respond by producing a hard sound with no flow or musical line, possibly wrong for the piece [one is] conducting."¹⁸⁶ He adds that "they'll also have trouble playing together, because eighty people are bound to have different reaction times to a series of sudden 'flicks.' "¹⁸⁷

Seaman reports that "many good conductors encourage the habit by smoothing out any impulses or 'clicks' in their gestures, allowing an orchestra to find its own ensemble instead of dictating every beat."¹⁸⁸ This is an important

¹⁸² Cook, 270.

¹⁸³ Cook, 270.

¹⁸⁴ Bamberger, *The Conductor's Art*, 211.

¹⁸⁵ Seaman, *Inside Conducting*, 68.

¹⁸⁶ Seaman, 68.

¹⁸⁷ Seaman, 68.

¹⁸⁸ Seaman, 79.

remark that also contradicts the ictus-focused instructions in conducting manuals. Instead of emphasizing the ictus, smoothing out the beats allows the orchestra to find its own pulse.¹⁸⁹ “Smoothing out the beats,” in turn, activates and energizes the gestures in between the beats.¹⁹⁰ One of the most important parts of the conducting gesture then, is what connects one ictus to the next: this is the rebound. Marple writes: “The eye and the psychology of the performer are impressed by the type of motion that the conductor uses between beat points much more than by the beat itself. For this reason the rebound development should begin early.”¹⁹¹ Marple adds that “one of the most important arm and hand movements in conducting is the rebound, for it is here that conducting style is first formed.”¹⁹²

Rebound-focused-conducting, as opposed to ictus-focused-conducting, does not anticipate the ictus as the exact moment of sound production. It does not focus on the precision and clarity of the beats themselves, but rather on the connecting gesture. Rebound-focused-conducting encourages the orchestra to find its own organic pulse and to make a warm and beautiful sound. Altogether, it allows the orchestra to play behind-the-beat. Seaman states that “Berlioz probably had this in mind when he ‘recommended that the stick pass quickly and lightly from one beat to the next to enable the orchestra to move and avoid a

¹⁸⁹ Seaman, 79.

¹⁹⁰ Seaman, 79.

¹⁹¹ Marple, *The Beginning Conductor*, 17.

¹⁹² Marple, 17.

heavy effect.’ ”¹⁹³ Behind-the-beat playing happens essentially because great orchestras observe the rebound before responding. Atherton confirms that “what takes place is that the entire beat is demonstrated before the ensemble responds - the preparation, ictus and rebound are all observed.”¹⁹⁴ He claims that this way, “The ensemble then has all of the information about the approach to the note, the quality of the attack, and how to continue once the note is sounded.”¹⁹⁵ According to Atherton, “the conductor may have almost completed the next beat” by the time the ensemble plays.¹⁹⁶ In the following quote, Furtwängler shares his personal journey coming to the realization of this special way of conducting:

How long it took me, a young conductor, starting out like other young conductors, to discover why every orchestra sounded so changed under the simple beats of Arthur Nikisch; why the winds played without the usual exaggerated sforzati, the strings with a singing legato, and the sound of the brass fused with the other instruments, while the general tone of the orchestra acquired a warmth which it did not have under other conductors. I learned to understand that this beauty of unified sound under Nikisch was not an accident; that this phenomenon, to put it more accurately, was caused by the way in which Nikisch “beat into” the sound.¹⁹⁷

Furtwängler’s description, “beating into the sound,” suggests focus on the connecting gesture; thus, the rebound.

A myriad of statements by conductors and conducting teachers found in conducting literature support the concept of rebound-focused-conducting.

¹⁹³ Seaman, *Inside Conducting*, 70.

¹⁹⁴ Atherton, *Vertical Plane Focal Point Conducting*, 38.

¹⁹⁵ Atherton, 38.

¹⁹⁶ Atherton, 38.

¹⁹⁷ Bamberger, *The Conductor’s Art*, 207.

Collectively they all describe the most important part of conducting as not the beats (as ictus-focused-conducting claims), but rather between the beats.

McElheran further highlights the importance of the rebound in showing what lies between the beats. He writes: "Don't hesitate at the bottom! This stops the sense of movement. Bounce, bounce, bounce! ... Keep the hand constantly moving."¹⁹⁸

Marple confirms this notion saying: "Specifically, it is the movement between the beats that is most important. This concerns the quality of the motion through the patterns and the ability of this motion to suggest the nature of the music."¹⁹⁹

Schuller also writes the following emphasizing what is in between the beats:

At least in any beat pattern of three or more, the hands can move laterally, expressing through the shape of the curved horizontal movements the mood, the character, the motion and direction of the music. In this context it is well to remind ourselves that the most important thing, from a technical point of view, is what a conductor does *between* the beats.²⁰⁰

Eugen Jochum, a German conductor whose conducting Furtwängler praised, instructs that "The player should be able to read...a tempo from the connecting gesture (that is the gesture executed between the 1-, 2-, 3-, 4 of the beat)."²⁰¹

Similarly, Seaman reports that while teaching at Aspen Music Festival, David Zinman often said, "The music happens *between* the beats."²⁰² In the following quote, Seaman confirms and validates the argument for rebound-focused-conducting:

If each beat lands like pudding on a plate, the orchestra will usually play

¹⁹⁸ McElheran, *Conducting Technique for Beginners and Professionals*, 33.

¹⁹⁹ Marple, *The Beginning Conductor*, 17.

²⁰⁰ Schuller, *The Compleat Conductor*, 61.

²⁰¹ Seaman, *Inside Conducting*, 70.

²⁰² Seaman, 70.

slower than the conductor intends. the baton needs to travel from the first beat to the second, even to spring away from the first beat toward the second, *as soon as* the first beat has been given and well before the second beat is due. Conducting with too much downward emphasis seriously bogs down an orchestra, whereas making connecting gestures and varying the space between the beats help create musical flow and shape.²⁰³

Focusing on the ictus as the precise moment when the sound should happen, causes the conductor to emphasize the beats and to become a “time-beater.”²⁰⁴ This kind of ictus-focused-conducting obstructs the natural flow and pulse of the orchestra. Rebound-focused-conducting allows and activates the connecting gesture, which promotes the orchestra to find its own organic pulse, and to make a warm and beautiful sound. Conclusively, it allows and facilitates the orchestra to play behind-the-beat.

²⁰³ Seaman, 70.

²⁰⁴ Schmid, *The Language of the Baton*, 3; Seidl, *On Conducting*, 2.

Chapter 6: Conclusion

Rebound-focused-conducting, as opposed to ictus-focused-conducting, allows and facilitates behind-the-beat playing, which is a natural and a universal phenomenon in the highest-level of orchestral music making. The rudimentary instructions in textbooks inhibit conductors from making this kind of organic and mature music. Furtwängler states:

Incidentally, there is nowadays a conducting technique which is taught in books and is practiced everywhere - a standardized technique, as it were, which produces a standardized orchestral sound. It is the technique of routine whose aim is simply precision. Here is something which should be a natural prerequisite to the proper leading of every orchestra is made into a final purpose, an end in itself.²⁰⁵

This standardized technique, as Furtwängler describes, “will never really do justice to the true requirements of music.”²⁰⁶ Quoting the late Russian writer who is regarded as one of the greatest authors of all time, he describes what is truly important: “Tolstoi says: ‘Ninety-five per cent of all artistic activity is routine, can be learned; that is not important. What is important, alone and exclusively, are the remaining five per cent.’”²⁰⁷ In conducting then, the “remaining five percent”²⁰⁸ would include the ability of the conductor to allow behind-the-beat playing through rebound-focused-conducting.

²⁰⁵ Bamberger, *The Conductor's Art*, 207.

²⁰⁶ Bamberger, 207.

²⁰⁷ Bamberger, 207-208.

²⁰⁸ Bamberger, 207-208.

Furtwängler writes that according to his experience, “even seasoned professionals, persons who have been intensely concerned with conducting and questions related to it, are baffled at the sight of a real conductor.”²⁰⁹ This, as explained in an earlier chapter, is largely attributed to the contradictions in the pedagogy of conducting technique. Rebound-focused-conducting suggests that the exact response point cannot, and should not, be pinpointed as in science. Furtwängler describes that in fact, precision is the “natural consequence of [his] ‘unclear’ conducting.”²¹⁰ As Furtwängler writes, “Conducting gestures must be judged from the aspect of the music,” not from precision.²¹¹ Carlo Maria Giulini, the late Principal Guest Conductor of the Chicago Symphony Orchestra, who also served as the Music Director of the Vienna Philharmonic and the Los Angeles Philharmonic in the latter half of the 1900s, shares the opinion of many musicians that conducting is “a very mysterious art.” In fact, Giulini professes that he has no idea what he really does on the podium.²¹² Antal Dorati, the Hungarian-born conductor and composer, who during his career held the Principal Conductor post of many orchestras such as the BBC Symphony Orchestra, the National Symphony Orchestra, and Detroit Symphony Orchestra, claims that, “By and large, orchestra conductors fall into two types”; “the ‘pros’ and the ‘magicians.’”²¹³ The magic lies in the ability of the conductor to manage

²⁰⁹ Bamberger, 214.

²¹⁰ Bamberger, 213.

²¹¹ Bamberger, 214.

²¹² Seaman, *Inside Conducting*, 77.

²¹³ Seaman, 78.

the mysterious connection between gesture and response, that allows behind-the-beat playing.

It is a given that, "Orchestral players like to know a conductor's interpretation by looking at him not by listening to his lectures."²¹⁴ Musicians especially dislike listening to a conductor say one thing and show another. Seaman shares that "Playing in spite of what a conductor does is a miserable and exhausting way to spend an evening, and orchestras are forced to do it far too often."²¹⁵ Unfortunately many musicians are "forced to play *in spite* of what they see, not *with* what they see,"²¹⁶ because of the conductors' misguided inclination for ictus-focused-conducting. The findings of this project reveal that the actual moment the higher-level musicians tend to organically produce the sound is not the point coming into the ictus but rather, during the rebound after the ictus. Even at earlier levels of conducting development, awareness and attention to the rebound as the moment when the sound is produced, rather than ictus, will help in managing any delay of a more mature orchestra. In addition, rebound-focused-conducting facilitates behind-the-beat playing, which helps to train and develop a lower level orchestra to improve.

As described in the opening paragraph, perhaps it's like a painter; who must first learn to color within the lines, before he can be free of any boundaries

²¹⁴ Seaman, 68.

²¹⁵ Seaman, 67.

²¹⁶ Seaman, 67.

in order to paint a masterpiece. A conductor must first learn the basics of “beating time” before he can be free to truly conduct the music. However, as in most fields, in order to become a professional, one must build professional habits as an amateur. In any level of conducting, propensity for rebound-focused-conducting through understanding and application of the behind-the-beat concept will yield benefits in communicating with the orchestra, musical connections, flow, tone production, and phrasing. It will generally promote an atmosphere for higher-level orchestral ensemble music making. This is the surest way to evolve from a conductor who “beats time,” to a conductor who conducts the music.

Further study on the relationship between conducting gesture and sound response will contribute to this mysterious and under-discovered field. A deeper investigation of this relationship may be able to answer, for example, why in different circumstances the degree of behind-the-beat playing increases or decreases. Atherton writes that when necessary, orchestras “do tie themselves to the beat, especially during passages of rhythmic difficulty.”²¹⁷ According to Seaman: “If the music is fast and rhythmic, orchestras usually play *with* the beat; they don't dare do anything else. It's in slower tempi that the time lag comes.”²¹⁸ Observations such as these imply that tempo and style of music are variables that affect the degree of behind-the-beat playing. A two-part study, one designed to measure the tempo of the music with respect to the degree of behind-the-beat

²¹⁷ Atherton, *Vertical Plane Focal Point Conducting*, 38.

²¹⁸ Seaman, *Inside Conducting*, 80.

playing, and another designed to analyze the style or character of the music in relation to the degree of behind-the-beat playing, would prove effective in illuminating these additional factors of behind-the-beat playing.

DEGREE RECITALS

1. Colorado Music Educators Association - Colorado All State 2018

Location: Denver, CO - Griffin Concert Hall at Colorado State University

Date: February 7– 11, 2018

Tchaikovsky: Marche Slav, op. 31 (12')

Marche Slave, Op. 31, translated as "Slavonic March," is an orchestral composition by Pyotr Tchaikovsky. It was first performed in Moscow on November 17th, 1876 conducted by Nikolay Rubinstein. The March is about twelve minutes long and is scored for 2 piccolos, 2 flutes, 2 oboes, 2 clarinets (in B-flat), 2 bassoons, 4 horns (in F), 2 cornets (in B-flat), 2 trumpets (in B-flat), 3 trombones, tuba, 3 timpani, military drum, cymbals, bass drum, tam tam, and strings.

Rubinstein, who was the director of the Russian Musical Society, commissioned Tchaikovsky to write the piece for a benefit concert for Serbian soldiers, as well as Russian volunteers who helped in fighting alongside the Serbs against the Ottoman Empire. On the title page of the manuscript score is an autograph inscription: "Serbo-Russian March on Slavonic folk themes." An intensely patriotic work, the march gradually progresses from Moderato in modo di Marcia funebre in B-flat minor, towards a triumphant conclusion Più mosso - Allegro in B-flat Major. About the premier, Tchaikovsky wrote, "Last Saturday my Serbo-Russian march was played here for the first time, which produced a whole storm of patriotic enthusiasm."

The highly programmatic march is based on Serbian and Russian folk themes. The first section depicts the oppression of the Serbs by the Turks. Tchaikovsky uses two Serbian folk songs, of which the first is marked "with the movement of a funeral march," "Come my dearest, why so sad this morning?" The second folk song is more optimistic in character, perhaps describing the happier times before the war. The second section musically depicts the Russians rallying to help the Serbs which eventually gives way to a grand statement of the Russian national anthem, "God Save the Tsar." The third section repeats the orchestral climax, reiterating the Serbian cry for help. In the final section, themes from "God Save the Tzar" returns triumphantly, representing the victory of the Slavonic people over tyranny.

Berlioz: Rákóczi March (6')

Hector Berlioz was born December 11th, 1803 in La Côte-Saint-André, Isère, France. His fascination with Goethe's *Faust* came at twenty-four years of age. Upon reading the work Berlioz immediately began writing *Eight Scenes from "Faust,"* often referred to as *La Damnation de Faust*. In 1845, he decided he would write his own text based on the Faust legend. Revisiting some of his earlier Faust compositions, Berlioz set his text to music and called it "mon grand opéra de Faust." Berlioz' *La Damnation de Faust* premiered in 1846 at the Opéra-Comique in Paris and was unfavorably received. He later gave up the idea of making it an opera and labelled it a "Légende dramatique en quatre parties" ("Dramatic Legend in Four Parts").

"Rákóczi March" (Hungarian: Rákóczi-induló), sometimes known as the "Hungarian March" came about when Berlioz was preparing to tour to Budapest. The March is about five minutes long and is scored for piccolo, 2 flutes, 2 oboes, 2 clarinets (in A), 2 bassoons, 4 horns (in A and D), 2 trumpets (in C), 2 cornets/pistons (in A), 3 trombones, tuba, 3 timpani, cymbals, bass drum, snare drum, triangle, and strings. In an effort to write something that will be loved by the Hungarians, Berlioz decided to write a piece on a Hungarian national tune. The origin of the tune used for the march is unclear, but it is said to have been created around 1730 by one or more anonymous composers. This early version is a setting of a Kuruc poem which is a lament complaining about the misfortune of the Magyars and the Habsburg oppression. The song calls for Francis Rákóczi II to save his people. Berlioz, inspired by the march, decided to include the march in his own version of the legend. He changed the location of his *La Damnation de Faust* from Germany to Austria. Berlioz also added a new scene which has nothing to do with Goethe's original *Faust*. In *La Damnation de Faust*, the "Hungarian March" plays while Faust sees an army pass by "on a plain in Hungary." Faust utters the words, "With such fire their eyes blaze! Every heart thrills to their song of victory—mine alone stays cold, indifferent to glory." The "Hungarian March" received such a positive reception in Budapest that the coda was completely drowned out by cheering. It is often referred to as the unofficial state anthem of Hungary.

Gustav Mahler: Symphony No. 1, IV. Stürmisch bewegt – Energisch (22')

Gustav Mahler was an Austro-Bohemian composer and conductor whose output marks the bridge between 19th century romanticism and the 20th century modernism in music. Mahler was born July 7, 1860 in Kalischt (Kaliště), near Humpolec, Bohemia (now Czech Republic). Mahler developed and expanded the symphonic form inherited from a long line of composers including Beethoven, Schubert, Bruckner, and Brahms. From Beethoven, Mahler borrowed the idea of using soloists and a choir within the symphonic genre; from many others, the concept of writing music with a narrative or "programme," and the idea breaking away from the traditional four-movement traditional symphonic form. In addition, Mahler took the ideas of expanding the size of the orchestra, length of the work, and emotional, philosophical, psychological landscape from Wagner and Bruckner.

Mahler's Symphony No. 1 in D major was mainly composed between late 1887 and March 1888. In addition to original material, it also incorporates music he had composed for previous works. During its composition, Mahler was the Second Conductor at the Leipzig opera. Although the subtitle, "Titan" still lingers to this day, Mahler actually only used this title for the second and third performances. He never used that title after the work had reached its final four-movement form in 1896. Mahler initially wrote an entire program for the work, which he dropped in 1896:

Part I: From the days of youth, "youth, fruit, and thorn pieces".

1. Spring and no end. This introduction describes the awakening of nature at the earliest dawn.
2. Flowerine Chapter (Andante).
3. Set with full sails (Scherzo).

Part II: *Commedia umana*

4. Stranded. A funeral march in the manner of Callot.
5. Dall'inferno al Paradiso, as the sudden expression of a deeply wounded heart.

The work is scored for the following instrumentation: 4 flutes (3rd and 4th doubling piccolos, 2nd doubling piccolo in movements 1 and 4 briefly), 4 oboes (3rd doubling cor anglais), 3 B \flat , A, C clarinets (3rd doubling bass clarinet and E \flat clarinet), E \flat clarinet (doubling 4th B \flat clarinet in movement 3 briefly, "doubled at least" in movement 4), 3 bassoons (3rd doubling contrabassoon), 7 horns, 5 trumpets (5th used only in movement 4), 4 trombones (4th used only in

movement 4), tuba, 6 timpani (two players), bass drum (with a cymbal attached to be struck by the same player in movement 3), cymbals, triangle, tam-tam, harp, and strings.

Mahler revised the score extensively on several occasions. He ultimately published the work in the traditional four-movement form. The first movement is in modified sonata form. The second is a scherzo and trio based on a Ländler (an Austrian folk dance in triple-meter). Initially, Mahler included an additional beautiful second movement, entitled *Blumine*, but it was removed by Mahler for the final publication in 1899. The third movement is a slow funeral march with a lyrical central section which features a double bass solo. The theme is based on the popular round "Bruder Martin," more commonly known as "Frère Jacques," which unlike the original, Mahler places in a minor mode. The fourth movement is an expansive finale in sonata-allegro form. It brings back several elements from the preceding movements, such as hunting calls first movement, thus unifying the entire symphony. The movement follows the quiet and subdued end of the third with a shocking cymbal crash and a dissonant explosion of sound. Mahler instructs "bells in the air" often throughout and in the finale, asks the horns to have their "bells in the air" (horns stand up here). Mahler explained that "at the end, the horns must cut through the massive sound in a chorale of salvation from paradise after the waves of hell."

2. University of Kentucky Opera Theatre and Symphony Orchestra

Location: Lexington, KY - Otis A. Singletary Center for the Arts

Date: March 4, 2018

Show Boat (140')

Show Boat is a musical in two acts, with music by Jerome Kern and lyrics by Oscar Hammerstein II, based on Edna Ferber's best-selling 1926 novel of the same name. The musical follows the lives of the performers, stagehands and dock workers on the Cotton Blossom, a Mississippi River show boat, over 40 years from 1887 to 1927. The themes in *Show Boat* include racial prejudice and tragic, enduring love. The musical *Show Boat* was first produced in 1927 by Florenz Ziegfeld. The quality of *Show Boat* was recognized immediately by critics, and it is frequently revived. When the show premiered in 1927, awards did not exist for Broadway shows, nor in 1932 when its first revival was staged. Late 20th-century revivals of *Show Boat* have won both the Tony Award for Best

Revival of a Musical (1995) and the Laurence Olivier Award for Best Musical Revival (1991).

Edna Ferber, a Pulitzer Prize-winning writer and the author of the 1926 novel *Show Boat*, at first did not like the idea of a musical adaptation of her book. She had reservations about setting her novel to the Broadway stage, where at the time musicals were “suffering from sameness and tameness” according to Stanley Green (author of *Broadway Musicals, Show by Show*). Ferber was concerned that, in setting *Show Boat* to a musical, her story would be subjected to the usual frivolous and light treatment of musicals of its day. However, Kern and Hammerstein convinced Ferber that their work would be different. They told her that this would be a new kind of show, one that would change the face of American musicals. This was indeed the case and more: *Show Boat*'s complex story comes to life through thought-provoking story-telling, other dramatic elements, and of course, glorious music.

Show Boat was filled with great tunes that capture and propel the complex drama. "Ol' Man River" especially made a deep impression on Ferber who is quoted as saying "I must break down and confess to being one of those whose eyes grow dreamy and whose mouth is wreathed in wistful smiles whenever the orchestra – any orchestra – plays 'Ol' Man River'... I never have tired of it... and I consider Oscar Hammerstein's lyric to 'Ol' Man River' to be powerful, native, tragic, and true." When Kern first played and sang the song for Ferber, she was overwhelmed. She responded, "I give you my word, my hair stood on end, the tears came to my eyes, I breathed like a heroine in a melodrama. This was great music. This was music that would outlast Jerome Kern's day and mine." Though the idea of slavery and indentured servitude seem like a thing in the past, the music and lyrics are powerful reminders of today's struggles with poverty and racism.

Memorable tunes in the show include "Can't Help Lovin' That Man," a song that describes a woman's unswerving devotion to her man which was another favorite from the musical. Among many others, some notable songs include "Make Believe," "Bill," "Cotton Blossom," and "Why Do I Love You?" As Kern and Hammerstein had hoped, many theater scholars agree that *Show Boat* marked the arrival of the modern musical. Geoffrey Block, theater scholar and author of *Enchanted Evenings: The Broadway Musical from Show Boat to Sondheim*, remarked that the show contains "unprecedented integration of music and drama, its three-dimensional characters, and its bold and serious subject matter." Richard Kislán declared that Hammerstein's libretto for *Show Boat* "brought

before the public for the first time the human and moral concerns that would become the heart of the enduring musical."

3. Diamond Bar High School Symphony Orchestra

Location: Sonoma, CA - Schroeder Hall at Donald and Maureen Green Music Center

Date: March 10, 2018

Rachmaninoff Symphony No. 2, mvt. 1, 2 (30')

Sergei Rachmaninoff (1873-1943) was a Russian composer, pianist and conductor of the late Romantic Period. His style of music is well-known for its beautifully long lines, song-like melodicism, deep emotional expressiveness, and rich orchestral colors. It took some courage for Rachmaninoff to compose the Second Symphony. The First Symphony, which premiered March 27, 1897 in St. Petersburg, was far from successful and had plunged Rachmaninoff into a serious depression. He found treatment and help from a psychiatrist named Dr. Nikolai Dahl, who helped Rachmaninoff regain his confidence to begin composing again. Thanks to Dr. Dahl's treatment, Rachmaninoff began composing the Second Piano Concerto, a work he dedicated to Dr. Dahl.

Rachmaninoff started composing the Second Symphony in October of 1906 and completed the first draft on New Year's Day, 1907. The work is about 60 minutes long without cuts which are common in performances of this work. Although the composer sanctioned cuts by his colleagues, he always conducted the original, uncut score. It is scored for the following instrumentation: Piccolo, 3 flutes, 3 oboes, English horn, 2 clarinets, bass clarinet, 2 bassoons, 4 horns, 3 trumpets, 3 trombones, tuba, timpani, bass drums, cymbals, snare drum, glockenspiel, and strings. It is in four movements – The first begins with an extended slow introduction marked Largo, opening with a motif that will appear in different variations throughout the work. Then the principal quick-tempo section marked Allegro moderato follows. The second movement is a vibrant scherzo (Allegro molto) which culminates in a brass's chorale, a transformation of the symphony's opening measures. The third is a beautiful slow movement marked Adagio, is based upon two melodies, presented in the beginning of the movement. The exciting and vibrant finale (Allegro vivace), recalls music from the previous movements, propels to an exuberant close. The cyclical nature of the themes in the symphony is reminiscent of Tchaikovsky's Fourth and Fifth Symphonies. Rachmaninoff once said, "I was completely under the spell of Tchaikovsky."

Rachmaninoff later revised and refined the score of his Second Symphony and conducted its premiere on February 8, 1908. The premiere was a success and the reception by the audience and critics finally vindicated Rachmaninoff after the humiliating premiere of his First Symphony. The Second Symphony was immensely popular throughout Rachmaninoff's life, and even today remains as one of his most beloved orchestral works.

4. Diamond Bar High School Symphony Orchestra

Location: New York, NY - Alice Tully Hall at Lincoln Center

Date: March 6 – 10, 2019

Shostakovich Symphony No. 10 (58')

Dmitri Shostakovich was born in Saint Petersburg Russia in 1906. He was a Russian composer and pianist who lived during a turbulent time in Russian history. During the Soviet era under Joseph Stalin, the Russian people were subjected to scrutiny and control. Critics of the regime were persecuted, and often disappeared without notice, never to be seen again. Shostakovich's music is often interpreted as a reaction to the regime, which tightly controlled his output. If he failed to satisfy Stalin and the communist party, Shostakovich's own life could be at stake. The first serious attack on his work occurred in January 1936. His opera *Lady Macbeth of the Mtsensk District* was a great success, but the infamous article in the Pravda, written under direct orders from Stalin, reported that it was "muddle instead of music."

Shostakovich wisely withdrew his Fourth Symphony, which he thought would endanger his life, and wrote the Fifth. The subtitle of the famous Fifth read, "The answer of a Soviet artist to justified criticism." Although the work was received by Stalin and the party with enthusiasm, Shostakovich's comments in Solomon Volkov's *Testimony* reveals that the expansive and powerful symphony is not glorifying the Soviet Party but is actually sarcastically depicting the regime and the horrors done to its people. In *Testimony*, Shostakovich describes that the Fifth is saying the following: "It should be clear to everyone what happened there. It is as if someone is beating you with a stick and says that it is your task to bring happiness, it is your task to bring happiness. So you stand up, moaning with pain, and say 'it is my task to bring happiness, it is my task to bring happiness!'"

Shostakovich's Tenth Symphony emerged from another major event: the death of Stalin on March 5, 1953. Shostakovich may have already made the first

sketches for the Tenth Symphony in 1951, although there is no concrete evidence of this. In the controversial *Testimony*, Shostakovich remarks, "I did depict Stalin in . . . the Tenth. I wrote it right after Stalin's death, and no one has yet guessed what the symphony is about. It's about Stalin and the Stalin years. The second part, the scherzo, is a musical portrait of Stalin, roughly speaking. Of course, there are many other things in it, but that's the basis." The work was premiered December 17, 1953 in Leningrad conducted by Yevgeny Mravinsky with the Leningrad Philharmonic. The reactions from the public and critics to the Tenth Symphony were mixed at first. In 1954, when the Union of Composers asked if the Tenth had a program, Shostakovich explained, "I wanted to convey human feelings and passions. Let them listen and decide for themselves."

The Tenth is about 50 minutes in length and scored for the following instrumentation: 2 flutes and piccolo (2nd flute also doubling piccolo), 2 oboes and English horn (doubling 3rd oboe), 2 clarinets and E-flat clarinet (doubling 3rd clarinet), 2 bassoons and contrabassoon (doubling 3rd bassoon), 4 horns, 3 trumpets, 3 trombones, tuba, timpani, triangle, tambourine, snare drum, cymbals, bass drum, tam-tam, xylophone, and strings.

The Symphony opens with an extended Moderato section that comprises nearly half of the work's total length. The second movement is a turbulent march which is "a musical portrait of Stalin." It is music of unrelenting terror and manic violence highlighted by a military drum. In the third-movement waltz, the composer introduces himself into the music with a motto derived from the German transliteration of his name, D. Schostakowitsch. He creates a musical signature – D, E-flat, C, and B, the D-S-C-H motive – from his first initial and the first three letters of his last name. Another motive, played repeatedly by the solo horn, comes from the name of one of his female pupils, Elmira Nazirova (E-A-E-D-A, or E-La-Mi-Re-A with solfège mixed in). The finale is like a celebration of the chains of Stalin being broken. The music builds to a massive climax, fortified by the D-S-C-H motive (in horns and trumpets), a declaration of the individual's triumph over a dehumanizing regime.

5. Music For All Honor Orchestra of America

Location: Indianapolis, IN - Clowes Memorial Hall & Howard L. Schrott Center for the Performing Arts at Butler University.

Date: March 16-17, 2019

Rimsky-Korsakov: Scheherazade (45')

Nikolai Rimsky-Korsakov, a Russian composer and a member of the group of Russian nationalist composers known as The Five, composed *Scheherazade* in 1888. The inspiration to write the piece came from Alexander Borodin, who was a friend and fellow composer of Rimsky-Korsakov. On February 27, 1887, the acclaimed Russian composer Alexander Borodin was attending a party when, after dancing a waltz, he died of a heart attack. The 53-year-old composer's sudden passing sent shockwaves through Russia's musical circles; Borodin had been one of their leading lights. Almost immediately thereafter, Rimsky-Korsakov went to Borodin's apartment to save his music. There he recovered his unfinished masterpiece, the opera Prince Igor. Wishing to rescue Borodin's crowning achievement from oblivion, Rimsky-Korsakov resolved to complete it. While working on Prince Igor in the winter of 1888, Borodin's epic and exotic opera sparked Rimsky-Korsakov's imagination. He decided to compose an orchestral suite with his own exotic melodies. His subject would be legend of The One Thousand and One Nights, a tale from *The Arabian Nights* which its first appearance dates back to the 10th century.

Rimsky-Korsakov's *Scheherazade* is a colorful orchestral masterpiece that depicts the exhilarating journey of love, intrigue and adventure. About 45 minutes in length, *Scheherazade* is itself a story about a storyteller – one of the greatest of all, who inspired this exotic music. Rimsky-Korsakov wrote a brief introduction that he intended for use with the score as well as the program for the premiere:

The Sultan Schariar, convinced that all women are false and faithless, vowed to put to death each of his wives after the first nuptial night. But the Sultana Scheherazade saved her life by entertaining her lord with fascinating tales, told bit by bit, for a thousand and one nights. The Sultan, consumed with curiosity, postponed from day to day the execution of his wife, and finally repudiated his bloody vow entirely.

Throughout, the music of *Scheherazade* showcases Rimsky-Korsakov's mastery as an orchestrator; in terms of the pure, sensory pleasure of sound, he is unsurpassed. The music of the waves alternates with delicate passages for solo instruments, and each time the "waves" return, the orchestration becomes richer and grander, climaxing in a shimmering fortissimo.

The four movements are:

- I. The Sea and Sinbad's Ship

- II. The Kalandar Prince
- III. The Young Prince and The Young Princess
- IV. Festival at Baghdad. The Sea. The Ship Breaks against a Cliff Surmounted by a Bronze Horseman

The piece is unified by the short introductions in the first, second and fourth movements, as well as an intermezzo in the third. The last is a violin solo representing Scheherazade, and a similar artistic theme is represented in the conclusion of the fourth movement. Writers have suggested that Rimsky-Korsakov's earlier career as a naval officer may have been responsible for beginning and ending the suite with themes of the sea. The peaceful coda at the end of the final movement is representative of Scheherazade finally winning over the heart of the Sultan, allowing her to at last gain a peaceful night's sleep.

Scheherazade premiered in Saint Petersburg on October 28, 1888 conducted by Rimsky-Korsakov. The work is scored for the following instrumentation: 2 flutes and piccolo (2nd flute doubling 2nd piccolo for a few bars), 2 oboes (2nd doubling cor anglais), 2 clarinets in A and B \flat , 2 bassoons, 4 horns in F, 2 trumpets in A and B \flat , 3 trombones, 1 tuba, timpani, bass drum, snare drum, cymbals, triangle, tambourine, tam-tam, harp, and strings.

6. Texas Private School Music Educators Association All-State String Orchestra
Location: Richardson, TX - Eisemann Center for the Performing Arts
Date: January 25, 2020

Wolfgang Amadeus Mozart, Eine Kleine Nachtmusik, Mvt. 1

On August 10, 1787 in Vienna, around the time when Wolfgang Amadeus Mozart was working on the second act of *Don Giovanni*, his Serenade No. 13 for strings in G major, K. 525. Admired for its lively, joyful quality and its memorable, timeless melodies, the work is better known by its famous German title *Eine Kleine Nachtmusik*. The work is for an ensemble of 2 violins, viola, and cello with optional double bass but is often performed by a string orchestra. In 1799, Mozart's widow Constanze sold a large bundle of her husband's compositions to the publisher Johann André in Offenbach am Main. The work was eventually published in 1827, long after Mozart's death.

Although it originally denoted an evening song for courtship, the term "serenade" by the late 18th century was used broadly to describe a chamber work intended

for light entertainment on a social occasion. Serenades enjoyed great popularity in south-central Europe, particularly in Vienna, where Mozart spent the last decade of his life. At that time, it was customary for ensembles to perform serenades in Vienna's parks and gardens, and the creation of such pieces became a lucrative source of income for composers.

The four-movement work opens with a bright allegro in sonata form, and then a slow, lyrical second movement follows. The third movement is a light minuet, while the finale is a brisk and exciting rondo.

- I. Allegro
- II. Romanze
- III. Menuetto
- IV. Rondo: Allegro

Benjamin Britten, Simple Symphony

Benjamin Britten was born November 22, 1913 in Lowestoft, Suffolk, England. He was a composer, conductor and pianist who became an important figure of 20th-century British music. He was precocious as a child and showed musical talents at a very early age. At age five, Britten started playing the piano and viola in addition to composing. By age fourteen, he had already composed a catalog of 100 opus numbers. Britten received a composition scholarship in 1930 at the Royal College of Music in London where he studied from 1930 to 1933.

The *Simple Symphony*, Op. 4, was written between December 1933 and February 1934 in his hometown of Lowestoft. Britten brought back bits of material he had written for the piano as a teenager. The *Simple Symphony*, Op. 4 is a lovely work for string orchestra or string quartet, which Britten dedicated to his childhood viola teacher Audrey Alston. Britten conducted its premiere in 1934 at Stuart Hall in Norwich. Britten wrote the following sleeve note for the recording made in 1956:

Once upon a time there was a prep-school boy. ... He was quite an ordinary little boy ... he loved cricket, only quite liked football (although he kicked a pretty "corner"); he adored mathematics, got on all right with history, was scared by Latin Unseen; he behaved fairly well, only ragged the recognized amount, so that his contacts with the cane or the slipper were happily rare (although one nocturnal expedition to stalk ghosts left its marks behind); he worked his way up

the school slowly and steadily, until at the age of thirteen he reached that pinnacle of importance and grandeur, never to be quite equaled in later days: the head of the Sixth, head-prefect, and Victor Ludorum. But – there was one curious thing about this boy: he wrote music. His friends bore with it, his enemies kicked a bit but not for long (he was quite tough), the staff couldn't object if his work and games didn't suffer. He wrote lots of it, reams and reams of it.

The work contains four movements and for each movement, Britten took a theme from two of his childhood works. The titles of the movements are descriptive and humorous, unlike the typical tempo markings: 1) Boisterous Bourrée, 2) Playful Pizzicato, 3) Sentimental Sarabande, and 4) Frolicsome Finale. In form, the symphony's four movements are in approximate classical shapes and key relationships: First and last movements are in Sonata-form, which frame the scherzo (second movement) and a slow movement (third movement).

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EDUCATION

University of Kentucky, D.M.A. Orchestral Conducting, 2017-2020

University of Southern California, M.M. Orchestral Conducting, 2008-2012

University of Southern California, M.M. Piano Performance, 2008-2010

Northwestern University, B.M. Piano Performance, 2004-2008

PROFESSIONAL EXPERIENCE

Director of Ensembles & Assistant Professor, Illinois Wesleyan University, 2020-present

Evaluator and Clinician, Music for All National Festival, 2012-present

Guest Conductor in Residence, Diamond Bar High School Symphony Orchestra, 2011-present

Assistant Conductor and Recruiting Liaison, Idyllwild Arts Summer Music Festival 2011-2020

Assistant Conductor, University of Kentucky Symphony Orchestra, 2017-2020

Assistant Conductor, UK Opera Theatre, 2017-2019

Assistant Conductor, Central Kentucky Youth Orchestra, 2017-2018

Assistant Conductor, UK Philharmonia, 2017

Lecturer, Chamber Orchestra Director and Instructor of Conducting, University of California, Santa Barbara, 2017

Music Director, Ainos Ensemble, 2013-2017

Music Director, Walnut Valley Symphony and Chorale, 2015-2016

Music Director, Oriental Mission Church, in Los Angeles, 2012-2015

Co-Music Director, University of Southern California Concert Orchestra, 2011

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