TONAL REFERENCES IN LUIGI DALLAPICCOLA'S QUADERNO MUSICALE DI ANNALIBERA

by

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ABSTRACT

This paper investigates the tonal references in Luigi Dallapiccola's *Quaderno Musicale di Annalibera* (1952), particularly movements 1 and 7, "Simbolo" and "Andantino Amoroso e Contrapunctus Tertius." Tonal references are present in three ways. First, triads and seventh chords are presented within the ordering of the twelve-tone row. Second, chordal transformations are presented in close position to encourage the listener to perceive them as such. Third, tonal references occur in the local tonic-dominant relationships, which are prevalent throughout the movement as well as the entire composition.

While the *Quaderno Musicale di Annalibera* is a twelve-tone composition, these fleeting moments of tonality can be seen throughout "Simbolo" and "Andantino Amoroso," as well as the remainder of the work. Through his use of tonal references, Dallapiccola is able to manipulate the row to provide the listener with a sound that, at times, seems both tonal and atonal.

CHAPTER I

INTRODUCTION

Luigi Dallapiccola's twelve-tone piece *Quaderno Musicale di Annalibera* (1952) is remarkable in its ability to create tonal references through the use of triadic vertical harmonies. This thesis will examine the composition's vertical harmonies, which set the *Quaderno* apart from other works of the same genre and style period. It will also discuss the piece's row through in-depth analyses of two of the work's eleven movements.

The *Quaderno Musicale di Annalibera* presents these tonal references in three ways. First, it presents triads and seventh chords within the ordering of row. Second, in the realization of the row, chordal voicings and their transformations are presented in close position, which may encourage the listener to perceive them as triads or seventh chords. Third, tonal references occur in the local tonic-dominant relationships, which are prevalent throughout the entire composition.

Chapter I is divided into three sections. Section 1.1 provides an overview of the *Quaderno Musicale di Annalibera.* Section 1.2 provides biographical information about Dallapiccola and compares the *Quaderno* to other works by the composer. Section 1.3 relates the tonal references of the *Quaderno* in a literature review to other works of the same genre and style period.

1.1 Overview

Section 1.1 is divided into two sections. Section 1.1a provides a brief history of the *Quaderno Musicale di Annalibera.* An overview of the entire work is given in Section 1.1b, with in-depth analyses of no.1, "Simbolo" and no. 7, "Andantino Amoroso e Contrapunctus Tertius" found in later chapters.

1.1.1 History and Overview of the *Quaderno Musicale di Annalibera*

The *Quaderno Musicale di Annalibera* was composed for the Pittsburgh International Contemporary Music Festival during a trip across Canada, the United States, and Mexico in August and September of 1952. Because of this, "it seems no mere coincidence that the two works written furthest from home (*Tartiniana* and *Quaderno)* should contain in transmuted form the feeling aroused by experiences and memories of Italy."[1] This *Musical Notebook for Annalibera,* which Dallapiccola dedicated to his daughter on her eighth birthday, recalls J. S. Bach's *Das Klavierbüchlein für Anna Magdalena Bach.*[2] In addition to the similarities in the titles, each was written as a series of simple piano pieces. Dallapiccola also pays homage to Bach with the famous BACH motive.[3] This is further explained in Chapter II.

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[1] Vlad (1957: 47). *Tartiniana,* published in 1951 by Edizioni Suvini Zerboni, is a divertimento for violin and chamber orchestra. Dallapiccola wrote it while teaching at Tanglewood during the summer of 1951.

[2] Burkhart (1994: 512).

[3] German notation: B – A – C – H = B♭

This same piece for solo piano was later transcribed for orchestra and was entitled *Variazioni per Orchestra* (Variations for Orchestra), which was commissioned by the Louisville Symphony Orchestra in 1954. The *Quaderno* likewise provides much of the thematic material for Dallapiccola's *Canti di liberazione* (Songs of Liberation), a composition for choir and orchestra, which commemorates Italy's independence from Fascist control.

1.1.2 General Overview

The *Quaderno Musicale di Annalibera* is Dallapiccola's only twelve-tone piece for solo piano. The work is divided into eleven movements, each lasting no more than three minutes. Dallapiccola described the *Quaderno* as "not at all variations in the traditional sense of the word. At the base of the whole composition, there is the same twelve-tone row, and there are eleven variations. The titles give an indication of the musical content."[4]

Also recalling J. S. Bach's *Das Klavierbüchlein für Anna Magdalena Bach*, the *Quaderno Musicale di Annalibera* combines movements in strict contrapuntal style with freely composed pieces. The work opens with "Simbolo," which is discussed in detail in Chapter II. The second piece, "Accenti," is marked *Allegro; con fuoco* and lasts only 27 seconds. This free movement is characterized by accented patterns of harmonic chords and tone clusters. "Accenti" then moves to a contrapuntal movement entitled "Contrapunctus Primus." This piece begins with the row form $T_e(P)$ rather than $T_f(P)$ as

[4] Barfoot (1998: 1).

in the first and second movements. Appearing as long fluid lines played against each other, the three-part canon ends as unobtrusively as it begins.

The fourth piece, "Linee," is marked *tranquillamente mosso*. This free movement is characterized by a slurred eighth-note melodic figure played over single *sostenuto* tones. It is followed by a second contrapuntal piece, "Contrapunctus Secundus (Canon Contrario Motu)." This *poco allegretto; "alla Serenata"* movement is a canon with entrances occurring one eighth note apart. The two voices continue through the end of m. 4 and, following a caesura, the canon begins again, continuing as before to the end of the movement. According to Roman Vlad, "the *staccato* notes are marked *quasi pizzicato* and the chords *quasi accordando*, as if to recall the light nocturnal strumming of guitars and mandolins."[5]

The sixth movement, "Fregi," follows the "Contrapunctus Secundus." This expressive movement reiterates the original row form in the upper voice. The row later returns in the lower voice in inversion. The third and final contrapuntal movement, "Andantino Amoroso e Contrapunctus Tertius (Canon Cancrizans)," follows as the seventh movement of the *Quaderno*. This piece is discussed in Chapter III.

"Ritmi" is the eighth movement of the *Quaderno*. Labeled *violento* and *ruvido*,[6] the movement imparts just these qualities. "In the two successive pieces, "Colore" (no.

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[5] Vlad (1957: 47).

[6] *Ruvido* – harsh.

9) and "Ombre" (no. 10), the interest is centered in the tone-color, whilst in the final "Quartina" the musical expression, though controlled, reaches its greatest intensity."[7]

1.2 Biographical Sketch of Dallapiccola

Section 1.2 is divided into two sections. Section 1.2.1 gives a biographical sketch of Dallapiccola as a composer. Section 1.2.2 describes the *Quaderno Musicale di Annalibera* in reference to other works by the composer.

1.2.1 Biographical Sketch

Luigi Dallapiccola was born in Pisino, Istria (now Croatia) on February 3, 1904. "Although Italian, Dallapiccola was born in a part of the country, which was then part of the Austro-Hungarian Empire. It was transferred to Italy in 1918 and is now part of Yugoslavia. A year earlier the family had been forcibly transferred to Graz, Austria, as Luigi's father was deemed to be a dangerous nationalistic agitator."[8]

His father, a professor of classical languages and an avid music lover, enrolled Luigi in piano lessons at an early age. The Austrian government believed his father was harboring pro-Italian sentiments. This was primarily because he was the headmaster of the local school, which made him politically suspect. Dallapiccola's family was first held in a detention camp on the border and later sent to Graz, Austria in March of 1917. While in Graz, Dallapiccola became acquainted with the music of Verdi and Wagner.

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[7] Vlad (1957: 48).

[8] Wright (1999).

After twenty months of internment, the Dallapiccola family returned to Pisino in 1919. Dallapiccola began his studies at the Conservatorio Luigi Cherubini in Florence, Italy two years later. His first degree in piano was awarded in 1924 and, continuing his studies, he received a degree in composition in 1931. Dallapiccola was later named to the faculty of the Conservatorio Luigi Cherubini in 1934. It was during this time that he became acquainted with contemporary music, even becoming an Italian representative for the International Society for Contemporary Music. Dallapiccola became interested in contemporary music in 1924 after hearing a performance of Schoenberg's *Pierrot Lunaire*. "A seed was sown then, which in due course, bore fruit in a gradual adoption of Schoenbergian twelve-tone technique."[9] He began using the twelve-tone technique in 1939 after being influenced by composers such as Busoni, Schoenberg, and Webern, using it almost exclusively after 1942. Dallapiccola was "noteworthy for putting the disciplined 12-tone serial technique at the service of warm, emotional expression."[10] The first twelve-tone piece Dallapiccola composed was the *Liriche Greche*, a cycle of three songs entitled "Cinque frammenti di Saffo" (1942), "Sex carmina Alcaei, una voce canenda nonnullis comitanibus musicis" (1943), and "Due liriche di Anacreonte" (1945).

In April of 1938, Dallapiccola married Laura Coen Luzzato, of Jewish descent. With the advent of World War II, Mussolini began his anti-Semitic policy, and Dallapiccola's wife was removed from her position at the National Library in Florence. Because of his wife's persecution as well as that of his own in his youth, much of

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[9] Morgan (1993: 122).

[10] Ciceran (2001).

Dallapiccola's music is highly political. It echoes cries of injustice and persecution and contains many thematic lines representative of freedom. "Dallapiccola, a modernist and serialist for most of his career, wrote politically committed music that was hardly in support of the status quo."[11] These themes are seen mainly in his vocal works, such as the *Il Prigioniero* (The Prisoner) and *Canti di Liberazione* (Songs of Liberation).

His only child Annalibera was born in 1944, the year Florence was liberated. She is the subject of the title piece, *Quaderno Musicale di Annalibera*, written for her birthday in 1952. In addition to his position at the Conservatory in Florence, Dallapiccola taught composition in the United States at various summer music camps such as Tanglewood and as a member of the faculty at Queens College in New York during the 1950s and 1960s. "Recognized by knowledgeable observers as one of the most talented composers of the new Italian generation,"[12] Dallapiccola received numerous awards for composition throughout the years and is generally acknowledged as the first Italian composer to adopt the twelve-tone system. He died in Florence in 1975 at the age of 71.

"Dallapiccola was the leading Italian twentieth-century composer between Puccini and Berio, and one of the most original receivers and refiners of the twelve-note method. His music possesses a textural clarity and simplicity of line that owes as much to the tradition of *bel canto* as to the example of Berg and Webern. However sophisticated

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[11] Hermann (1997: 3.5).

[12] Nathan (1974: 163).

his harmonic and rhythmic invention, he never forgot that the origins of music lay in the voice."[13]

1.2.2 Other Works by Dallapiccola

While the instrumental music of Dallapiccola is not unknown, the majority of his music is written for voice. According to Roman Vlad, "the composer's marked preference for the human voice is in evidence from the very beginning, and is set into relief by the special vocal quality pervading all his later works, even those of which are purely instrumental."[14]

Dallapiccola began his composition career in 1925 with three songs for voice and piano, entitled *Fiuri de Tapo*. Though none of his first compositions were published or performed before 1929, they were all written for voice and some other medium, such as chamber ensemble, chorus, orchestra, or solo instrument. All of the music composed in Dallapiccola's early period, save one piece for three pianos, was composed for voice. By the end of his career, less than twenty of his compositions were composed for a medium other than voice.[15] He is known mainly for his operas and vocal works.

The fact that the *Quaderno Musicale di Annalibera* is Dallapiccola's only twelve-tone work written for piano is interesting in light of the fact that he was a Professor of piano at the Conservatorio Luigi Cherubini in Florence. He wrote very little for his

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[13] Grashoff (1999).

[14] Vlad (1957: 5).

[15] This is based on Dallapiccola's list of published works as listed in Nicolodi (1975), not including compositions found only in manuscript, transcriptions, revisions, or realizations.

primary instrument. According to Donald Martino, Dallapiccola's music was not played much in Italy, and he was simply known as "this nice man who taught piano and some Fullbrights [*sic*]."[16]

The *Quaderno* is not Dallapiccola's only dodecaphonic work exhibiting tonal references. The aforementioned *Liriche Greche* (1942-1945) also contains tonal references, as do his works, *Ciaccone, Intermezzo e Adagio*, and *Rencesvals*. One may see in these works "the search after a still clearer action of tonal forces in a fully chromatic context."[17]

1.3 Literature Review

Numerous authors have approached Dallapiccola's twelve-tone music and noted its tonal features. Brian Alegant states that very little has been written about Dallapiccola's music due to his "idiosyncratic handling of the 12-tone system. Dallapiccola uses tone rows in ways that, until now, have proven analytically resistant."[18] John D. White claims that Dallapiccola composed a row for the *Quaderno Musicale di Annalibera* in order to endow the piece with "triadic qualities."[19] Roman Vlad writes of particular movements as having "harmonic implications"[20] and Stefan Kostka discusses

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[16] Boros (1991: 221).

[17] Vlad (1957: 30).

[18] Grashoff (1999).

[19] White (1995: 103).

[20] Vlad (1957: 47).

"tonal implications"[21] and "diatonic 'progressions'"[22] in the work. Building on this research, this thesis will analyze the row's ability to provide the tonal references produced by the piece's vertical harmonies.

While most composers "avoid using in a row any combination of pitches that would recall tonal music, such as triads, scale segments, and traditional bass or melodic formulas,"[23] the *Quaderno Musicale di Annalibera* exhibits both triadic harmonies as well as vocal-like melodies, only loosely adhering to the rules of classical twelve-tone serialism. Many composers turned to serialism as a way to break free of the tonal system and embrace new ideas, yet this style of composition had its own typical features as well. According to John D. White,

> "...If the objective is to avoid traditional triadic substructures, as it was for the members of the Second Viennese School, then intervals of thirds, sixths, and perhaps even perfect fifths are to be avoided in the construction of the tone row. Luigi Dallapiccola, however, consciously chose such intervals in the construction of the tone row for his *Quaderno Musicale di Annalibera* in order to endow his harmonic language in that work with triadic harmonies."[24]

Members of the Second Viennese School exerted an influence on Dallapiccola. Milton Babbitt "discusses an instance of borrowing in the music of Luigi Dallapiccola, demonstrating that 'Contrapunctus Secundus' from Dallapiccola's *Quaderno Musicale di*

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[21] Kostka (1999: 208).

[22] Ibid., 209.

[23] Ibid., 203.

[24] White (1995: 103).

Annalibera is a gloss on the second movement of Webern's *Piano Variations, Op. 27.*"[25] This is but one instance of Dallapiccola's engagement with the music of Webern and Schoenberg. "There came the time when Dallapiccola embraced serialism and he thought he knew all about twelve-note music but, when studying Webern, he realized that he was very limited. His work fell into great decline and he became a prisoner of personal failure."[26] During this period of time, Dallapiccola composed very little.

Though Dallapiccola closely studied the serial music of the Second Viennese School, not all of the music produced by the latter was necessarily atonal. Many twelve-tone works of the Second Viennese School were full of tonal references. A perfect example of this is the Violin Concerto by Berg. A portion of the work is based on a Bach harmonization of the Lutheran chorale, "Es ist Genug,"[27] a diatonic Carinthian folk melody, and the *Hauptrhythmus*[28] shown in Example 1.1.

Example 1.1

The *Hauptrhythmus* in Berg's Violin Concerto

[25] Burkholder (2001). See also Dembski (1987).

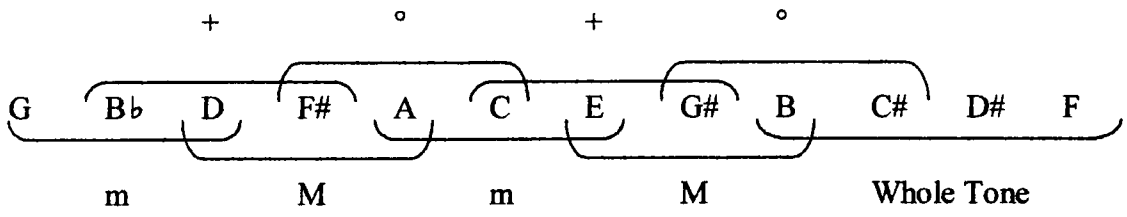
[26] Wright (1999).

[27] This is taken from Bach's Cantata BWV 60 (1723).

[28] *Hauptrhythmus* – rhythmic motive.

The Violin Concerto was Berg's final composition, composed in 1935, and was first performed posthumously on April 19, 1936. "As in his previous works, but even more notably, the apparent intertwining of tonal and twelve-tone elements stems from the common source of Berg's cyclic language."[29] These references are first seen in the row. "The basis row of the concerto is designed in such a way that tonal combinations become practically inevitable."[30] The row, <G-B♭-D-F#-A-C-E-G#-B♮-C#-D#-F>, outlines a G minor triad with its first three pcs, and a B♭ augmented triad with pcs 2-5. Berg outlines a D major triad with pcs 3-5, an F# diminished triad with pcs 4-6, and an A major triad with pcs 5-7. Pcs 6-8 compose a second augmented triad on C and there is also an E major triad built on pcs 7-9. The row ends with pcs 9-12 hinting at the beginning of a whole tone scale. This division of the tone row is seen in Example 1.2 below.

Example 1.2



[29] Headlam (1996: 357).

[30] Grout (1988: 861).

These tonal references are further solidified by the solo violin, which enters on arpeggiations of its open strings, G, D, A, and E after the harp's entrance on the arpeggiated fifths B♭, F, C, and G. Many of the melodic lines in the concerto are built on these fifths. This is true of the ending as well. Following a series of solos by various instruments of the ensemble, the first violin ends the work with a return of the arpeggiated fifths, which is answered by the contrabass, bringing the concerto to a close.

Numerous tonal references are present in Berg's Violin Concerto, just as such references are present in the twelve-tone works of other composers of the Second Viennese School. The work of Schoenberg, Berg, Webern, and others during the early years of the twentieth century greatly influenced the twelve-tone music of Dallapiccola.

This thesis demonstrates how Dallapiccola was able to compose an eleven-movement work for piano that is twelve-tone in composition but bears many references to tonality. This thesis will analyze both the twelve-tone technique and survey the tonal references in Dallapiccola's *Quaderno Musicale di Annalibera* through in-depth analyses of the first and seventh movements, "Simbolo" and "Andantino Amoroso e Contrapunctus Tertius."

CHAPTER II

ANALYSIS OF MOVEMENT NO. 1: "SIMBOLO"

Chapter II provides an analysis of "Simbolo." Section 2.1 gives a brief introduction and an overview of the piece's row. Section 2.2 describes the movement's form. Analyses of tonal references and serial transformations are provided in Sections 2.3-2.5. Section 2.6 provides a conclusion.

2.1 Introduction

"Simbolo," meaning "symbol" in English, is aptly named; Vlad describes the movement as a "symbolic tribute to Bach."[1] The movement begins with a low-register repeating eighth note figure, which gives the opening of "Simbolo" an almost foreboding quality. At the same time, the tempo is marked *Quasi lento* and long fluid lines appear throughout. Floating above this rhythmic pattern, a series of deliberate *sostenuto* chords gains prominence. This is then interrupted by a rapidly moving chordal section with note values of varying lengths. Because of the anticipation of where the next chord will fall, the listener is kept in suspense before the piece returns to the opening figure.

Dallapiccola continues to alternate between these two musical ideas for the remainder of the movement. The only deviation occurs in m. 17, with a dramatic change in texture. Dallapiccola alters the *sostenuto* chord motive by incorporating a new musical section. The rapidly moving chordal section returns, but faster and in a higher register,

[1] Vlad (1957:47).

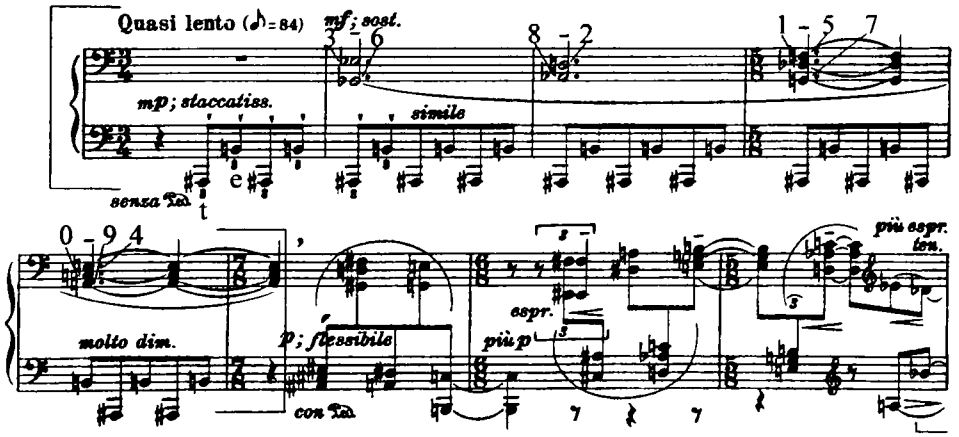
which provides the climax of "Simbolo" before returning to the thematic material introduced at the beginning of the movement. The movement ends with the musical motive heard at the beginning of "Simbolo," but unlike the beginning of the movement, the final *sostenuto* chord sounds long after the last repeating eighth note figure. This ending leaves the audience hanging, and propels them forward to find a resolution in the remaining movements.[2]

The opening measures of "Simbolo" introduce the row of the work. The row, which first appears as $T_t(P)$ = <B♭-B-E♭-G♭-A♭-D-D♭-F-G-C-A-E>,[3] serves as the basis for all eleven movements of the work. This is seen in the first five measures of the movement, provided in Example 2.1.

Example 2.1

Measures 1-8 of "Simbolo"

Bracketed section shows the row $T_t(P)$ = <B♭-B-E♭-G♭-A♭-D-D♭-F-G-C-A-E>



[2] Lewin (1993: 15).

[3] Pitch class integers "10" and "11" are labeled "t" and "e," respectively. Therefore, $T_{10}(P)$ is labeled as $T_t(P)$.

2.2 Form

The form divides into three sections resembling an A-B-A^1. Measures 1-16 introduce the row and its first transformations. Section A is further divided into smaller sections discussed later in Section 2.3. The B section begins in m. 17 with a change in both texture and tempo.[4] This section includes the climax of the movement and is discussed in Section 2.4. Measures 37-46, analyzed in Section 2.5, provide the return of A, only shorter in length, and brings the movement to a close. This final A^1 section is puzzling because it seems incomplete.[5] Because the final *sostenuto* chord continue to sound long after the *staccatissimo* dyad motive ends, "we are impelled onward to the following pieces of the *Quaderno*."[6]

2.3 Measures 1-16

The A section of "Simbolo" is divided into alternating patterns of fluid *sostenuto* chords accompanied by a rhythmic ostinato pattern and transformations of eighth note chords appearing in rapid succession. Section 2.3 of the thesis is divided into four parts. Section 2.3.1 provides an analysis of mm. 1-5 and Section 2.3.2 of the thesis discusses mm.6-10. Measures 11-14 make up Section 2.3.3 and Section 2.3.4 provides the analysis of mm. 15-16. Example 2.2 provides an analysis of the row forms found in mm. 1-16.

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[4] Lewin (1993: x).

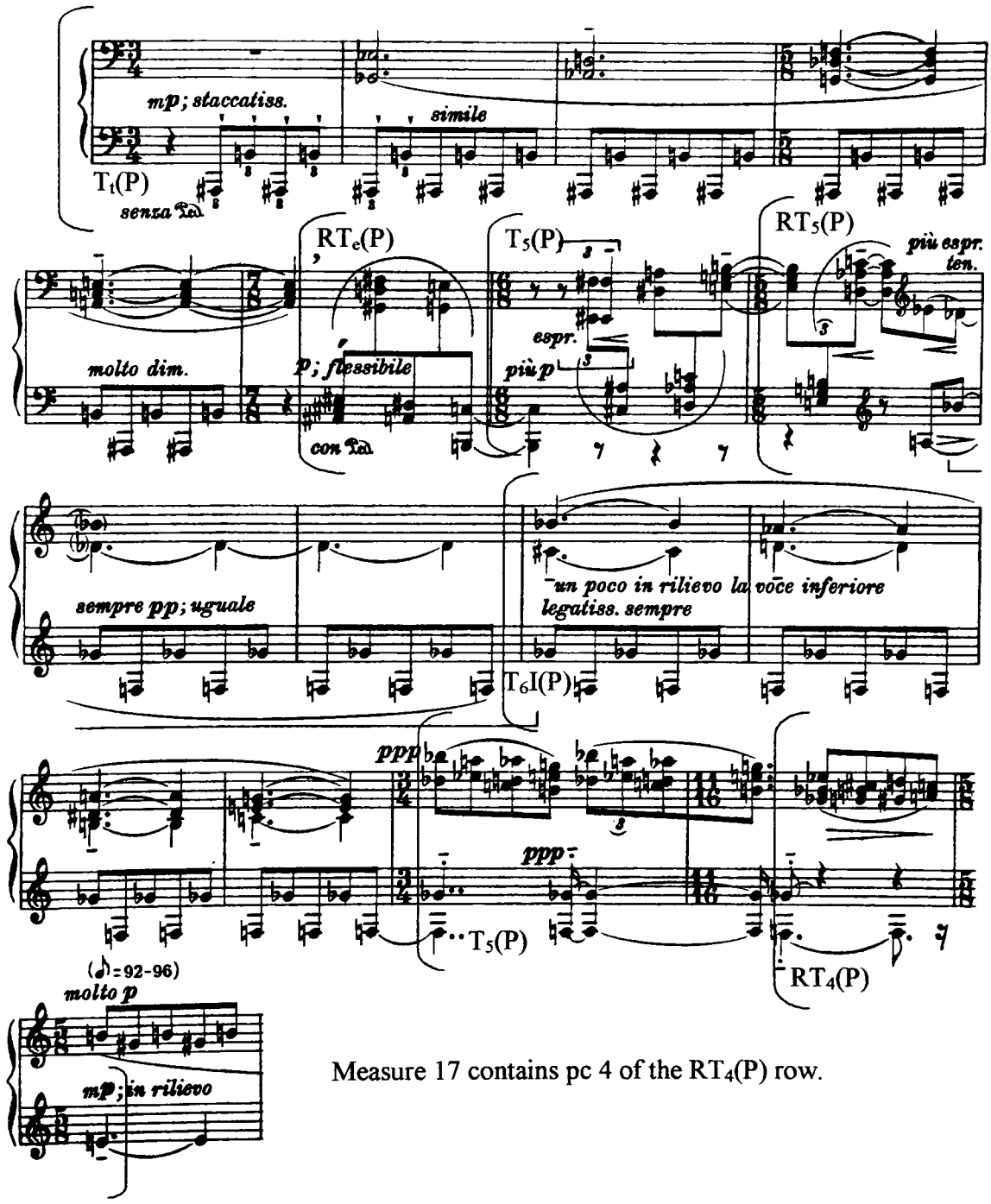
[5] Ibid., 15.

[6] Ibid., 15.

Example 2.2

Section A of "Simbolo" – Measures 1-16

Bracketed sections indicate row forms.



Measure 17 contains pc 4 of the $RT_4(P)$ row.

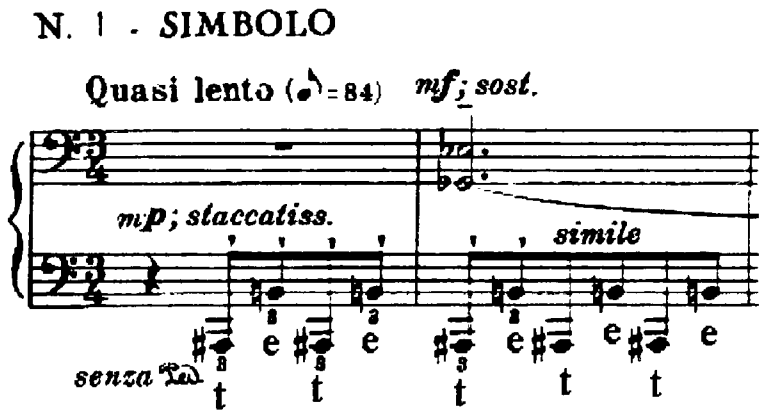
2.3.1 Measures 1-5

The first five measures of "Simbolo" introduce the row of the work. It begins with a repeating eighth note dyad, <A#1, B2>.[7] This motivic dyad, which comprises the first two pcs of the row, appears in the left-hand bass line and is played *staccatissimo* with long *sostenuto* chords appearing above it in mm. 2-5. This can be seen beginning in mm.1-2 of the left hand in Example 2.3.

Example 2.3

Measures 1-2, "Simbolo"

Note the <A#1, B2> in the LH part, labeled t & e, respectively.



The sparse texture of the introduction is deceiving, for its performance is far from simple and requires much thought on the part of the performer. Because the repeating bass dyad must be played *staccatissimo*, the music is marked *senza pedale*. This makes

[7] The integers indicate the octave placement (Middle C = C4). Order is indicated by <>. Unordered pitches or pcs are indicated by {}.

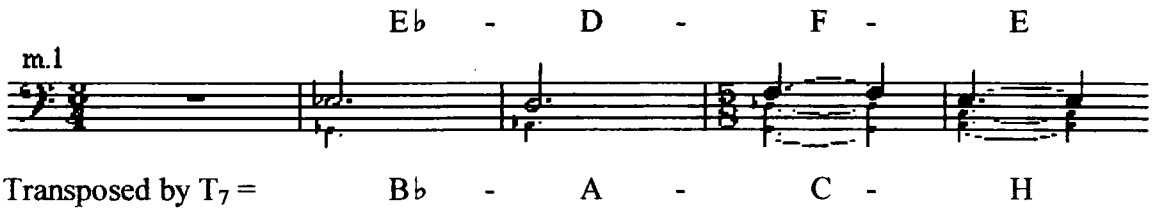
playing the right-hand line difficult, for the performer must use unusual fingerings in order to maintain the *sostenuto* effect. These *sostenuto* chords of mm. 2-5 are drawn from the remainder of the row.

The upper part of the left-hand *sostenuto* line presents a BACH motive, which is first heard in "Simbolo" in the uppermost voice of mm.2-5, with the notes E♭-D-F-E. Example 2.4 shows the right-hand part of mm. 1-5. The BACH motive is indicated by larger noteheads. The voice is later transposed so that "m. 7 at last presents the motive at the 'correct' pitch-class level (B♭-A-C-B)."[8] Dallapiccola's symbolic homage to Bach is also noted in the title of the work. Dedicated to his daughter on her eighth birthday in 1952, this *Quaderno Musicale di Annalibera* recalls J. S. Bach's *Das Klavierbüchlein für Anna Magdalena Bach.*

Example 2.4

Measures 1-5, "Simbolo" – RH line only

BACH line shown in larger noteheads, stemmed upward



[8] Lewin (1993: 6).

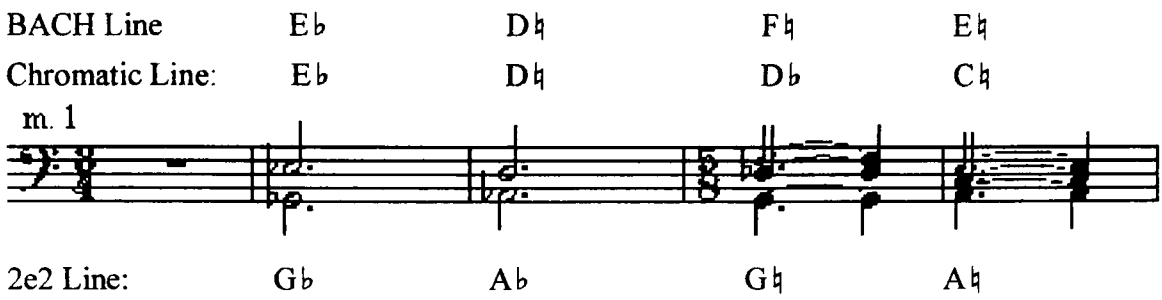
The remaining pcs of the right-hand line are found in a chromatically descending "alto" line and in an ic2 flavored G♭-A♭-G-A "tenor" line.[9] The chromatic line, {E♭, D, D♭, C}, shares the first two pcs of the BACH motive in mm. 2-5 and continues to move down by half step. The last two pitches of this line create a major and minor third respectively with the remaining F3 and E3 of the BACH line. The 2e2 line, so named because of the 2e2 pitch class interval succession it creates, makes up the lowest or "tenor" part of the right-hand line.[10] This arrangement of *sostenuto* lines over a repeating +13 dyad works very well with the row ordering Dallapiccola chose to serve as the basis for the remainder of the *Quaderno*. Example 2.5 shows the 2e2 line with the stems pointing downward. The BACH line is shown in smaller noteheads, stemmed upward, excluding the E♭ and D, which are shared with the descending chromatic line, also stemmed upward.

[9] Lewin (1993:1).

[10] The ordered pitch class interval between G♭ and A♭ is 2; between A♭ and G is 11, and between G and A is 2, thus the 2e2 label.

Example 2.5

RH line of mm. 1-5 of "Simbolo"



The first *sostenuto* chord is m. 2's {E♭3, G♭2}. A♭2 and D3 follow this in m. 3. The top voice in m. 4 contains the pitches D♭3, F3, and G2. Measure 5 completes the row with the *sostenuto* notes C3, A2, and E3. Thus, the row of the work is $T_t(P)$ = B♭-B-E♭-G♭-A♭-D-D♭-F-G-C-A-E.[11] The listener cannot ascertain the row at this point but will recognize it long before the close of the *Quaderno Musicale di Annalibera.* The row ordering is unveiled before the close of the movement and is implemented in the remaining movements as the composition further unfolds.

Example 2.6 shows the first two systems of "Simbolo." The two large brackets indicate the row form and the pcs are labeled with their integers. The row is labeled $T_t(P)$ because the original row begins on pc t.[12]

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[11] $T_t(P)$ = <t-e-3-6-8-2-1-5-7-0-9-4> in integer notation. This paper uses the row labeling system of Robert Morris (1991). To find $T_0(P)$ = <0-1-5-8-t-4-3-7-9-2-e-6>, one must transpose the original row by T_1 so that the row begins with 0.

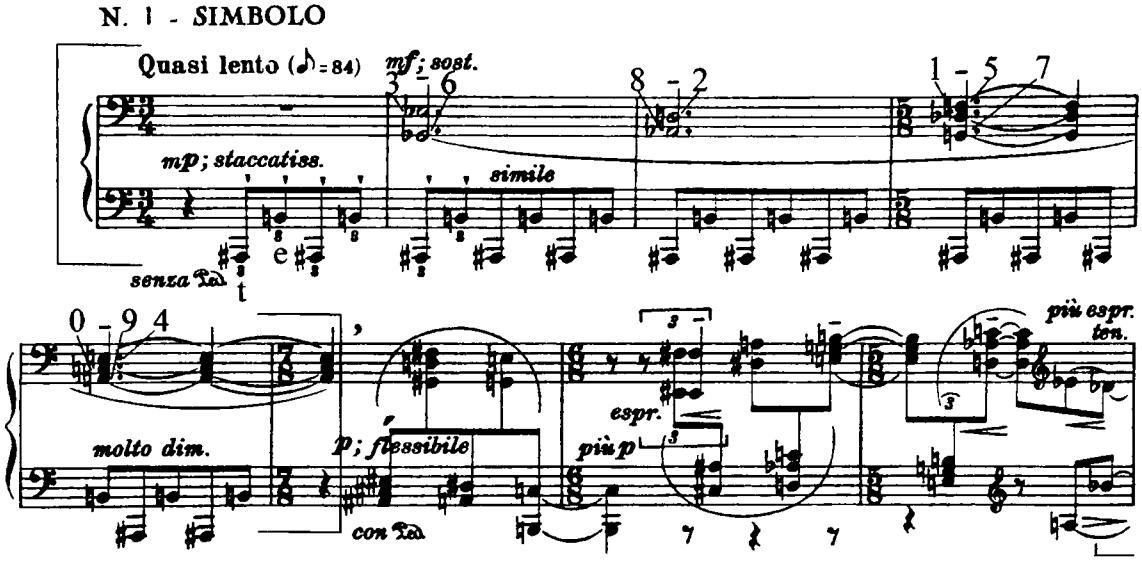
[12] To find $T_0(P)$ = <0-1-5-8-t-4-3-7-9-2-e-6>, one must transpose the original row by T_2 so that the row begins with 0.

Example 2.6

Measures 1-8 of "Simbolo"

The row of the *Quaderno Musicale di Annalibera:* B♭-B-E♭-A♭-D-D♭-F-G-C-A-E

Bracketed section shows the row $T_t(P)$ = <t-e-3-6-8-2-1-5-7-0-9-4>



Tonal implications can be seen as early as the aforementioned measures. The first chord in m. 2 could be heard as an E♭ minor triad if one listened only to the A# (enharmonically spelled as B♭ for this purpose) rather than the B♮ in the lower voice. This is easy to hear because the A# is metrically accented, occurring on beats 1, 2, and 3 and is lower than B♮. Even though the minor triad occurs only on downbeats of the

measure, the {E♭, G♭, B♮} chord sounding on the upbeat is not dissonant to the ear, in part because {E♭, G♭, B♭} and {E♭, G♭, B♮} belong to the same set class, 3-11(037).

Calling this aforementioned E♭ minor figure tonic, it then moves to the "dominant" B♭ seventh chord with a missing fifth in m. 3.[13] This is unusual because local tonic-dominant motions are rare in twelve-tone composition. Again, the B♮ in the lower voice continues to sound as the root of a B^{o7} chord.[14] The following measure can be understood as a $G^{ø7}$ chord using the A# (enharmonic B♭) in the left hand and the final chord of the row in the right hand of m. 5 can be heard as an as an A major triad.

While the row is the basis of the entire composition, set classes serve as the basis of realizing the row. These set classes occur as subsets of the row. This use of derivational subsets not only lends itself to structural variety, but also allows the listener and performer to divide the row into aurally perceivable segments. One can differentiate pcs if they are introduced in small subsets. It is easier to hear three, four, and six notes at a time, rather than twelve in a row in no particular pattern. For example, the three *sostenuto* lines that make up the chords found in the right-hand part of mm.1-5 all form members of set class 4-1 (0123). This helps the listener draw similarities between the <3-2-5-4> BACH motive, the descending <3-2-1-0> chromatic line, and the 2e2 line. When listening to the individual lines, as one would when practicing the piece for

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[13] This is mentioned only to illustrate the local tonic-dominant relationship.

[14] {B♮, D, F (missing), A♭}.

performance, this likeness of the subsets becomes evident. With this in mind, the performer can decide which subsets to bring out.

One can also divide $T_t(P)$ into two hexachords, <t-e-3-6-8-2> and its literal complement, <1-5-7-0-9-4>, both of which belong to sc 6-31 (014579). The aforementioned subset 6-31 (014579) as compositional device also creates hexachordal combinatoriality. The prime form of the row, $T_0(P)$ = <0-1-5-8-t-4-3-7-9-2-e-6>, can map onto its complement at $T_7I(P)$ = <7-6-2-e-9-3-4-0-t-5-8-1>. The hexachord <0-1-5-8-t-4> maps onto its complement <3-7-9-2-e-6> via both the $T_0(P)$ and $T_7I(P)$ transformations. Like all hexachords, $T_0(P)$ can also map onto itself, or $RT_0(P)$, through retrograde-combinatoriality. This can be seen in Example 2.7.

Example 2.7

Hexachordal Combinatoriality

	H-1	H-2
$T_0(P)$ =	< 0 1 5 8 t 4	3 7 9 2 e 6 >
$T_7I(P)$ =	< 7 6 2 e 9 3	4 0 t 5 8 1 >
	H-2	H-1

	H-1	H-2
$T_0(P)$ =	< 0 1 5 8 t 4	3 7 9 2 e 6 >
$RT_0(P)$ =	< 6 e 2 9 7 3	4 t 8 5 1 0 >
	H-2	H-1

While the potential for hexachordal combinatoriality is built into the rows, Dallapiccola does not use it for the basis of the composition; rather, he uses tonal references. Set class 6-31 (014579) has the ability to provide tonal references because it embeds four members of sc 3-11 (037) and one member of sc 3-12 (048).[15] These set classes may form both major and minor triads and also augmented triads. This is why it is easier for listeners to hear the local tonalities created in the row throughout the composition.

Even though the $T_t(P)$ row form, which serves as the basis for the *Quaderno Musicale di Annalibera*, is presented in the first five measures of "Simbolo," the listener is not yet able to ascertain the ordering of the row. Dallapiccola gives the listener and performer this opportunity in the ensuing measures by composing rapid transformations in the next several measures.

2.3.2 Measures 6-10

Dallapiccola set the original row form apart from following transformations through stylistic markings. The original row is played *mezzo piano* with a *staccatissimo* bass line repeating under a *sostenuto* upper voice. The texture changes radically in m. 6 with the addition of the pedal and a drop in dynamic level to *piano*. The score is marked *flessibile* and *espressivo* and the line moves in chordal eighth notes rather than in longer chords that carry through the entire measure.

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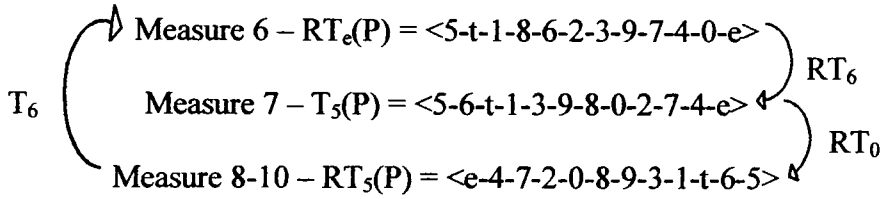
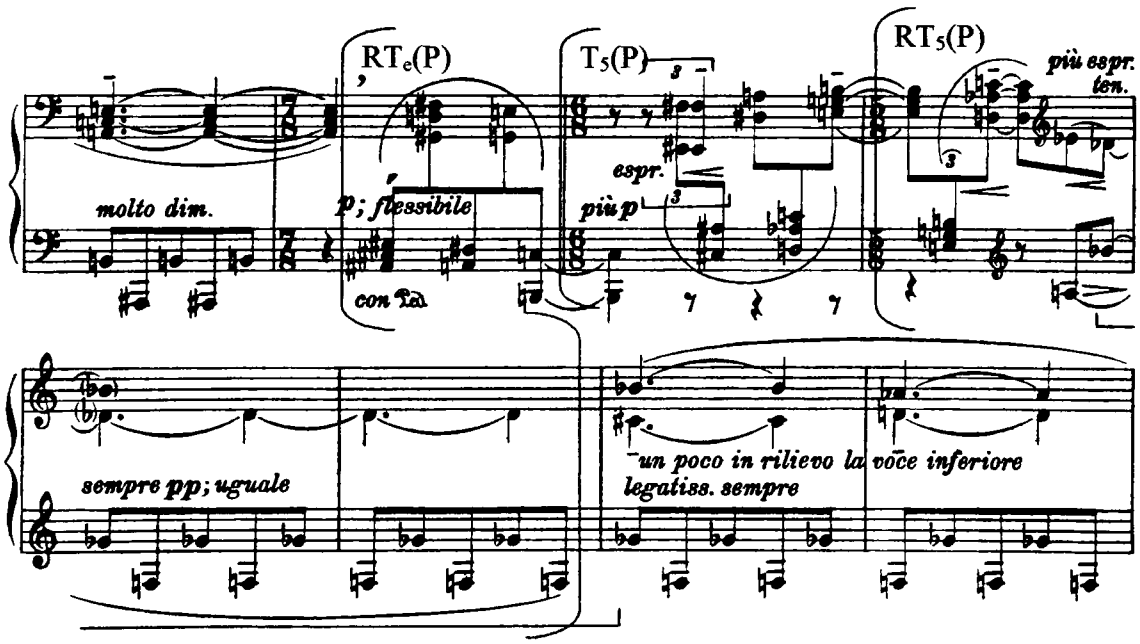
[15] Morris (1991: 136).

After the presentation of $T_t(P)$ in mm. 1-5, nearly every measure presents a new ordering based on the retrograde of the previous transformation. By m. 10, Dallapiccola has composed three transformations of the original row, nearly all of which are retrogrades of the previous. These relationships are seen in Example 2.8. Only the second transformation in m. 6 is different because T_1 is added to its retrograde. By the end of m. 10, the listener may well be able to recognize the row.

Example 2.8

Measures 5-12 of "Simbolo"



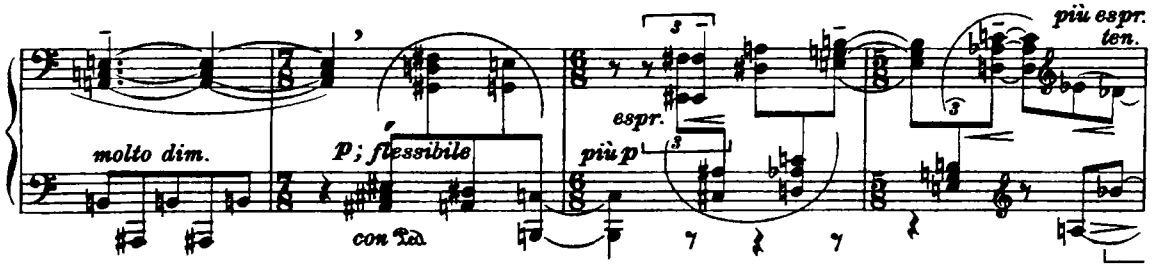


Another interesting compositional device used in mm. 6-8 is Dallapiccola's use of time signatures. When the second row form appears in m. 6, the time signature changes to 7/8. The following row moves into 6/8 and the last returns to 5/8. This produces a state of ambiguity about where the downbeat falls and thus catches the listener's attention. This is seen in Example 2.9.

Example 2.9

Measures 5-8 of "Simbolo"

Time Signature Changes – (m. 5 begins in 5/8)



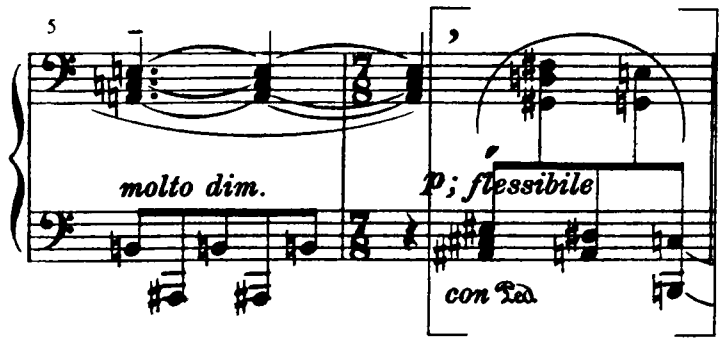
The second row form of "Simbolo" comes in m. 6, as seen in Example 2.10. By now the listener hears a similarity between mm. 1-5 and m. 6 because the latter sounds much like the beginning five measures played as eighth notes rather than long chords.

Example 2.10

Measures 5-6 of "Simbolo"

The Row of Measure 6 (bracketed section):

$RT_e(P)$ = <5-t-1-8-6-2-3-9-7-4-0-e>



The new row form is $RT_e(P)$ = <5-t-1-8-6-2-3-9-7-4-0-e>. This row form is easy to hear because the pcs that make up the "chords" sounding in the right-hand of the of the first five measures are now played in the same position and octave, but in reverse and one half-step higher. Specifically, the row sounds familiar to the ear because while the transformation is the retrograde of the previous row at T_1, it also occupies the same register.

The bar begins with the A minor chord from the previous row tied over the measure. This chord is then taken up one half step to an A# minor chord. The next chord, {G#2, F#3, D3}, can be understood as $G\#^{\varnothing 7}$ with a missing third. The following chord, {D#3, A2}, is then succeeded by the chord, {G2, E3}. The final chord is another

+13 dyad, {C3, B1}.[17] This dyad is similar in sound to the opening <t, e> dyad of the piece. It is transposed only a semitone higher than the original.

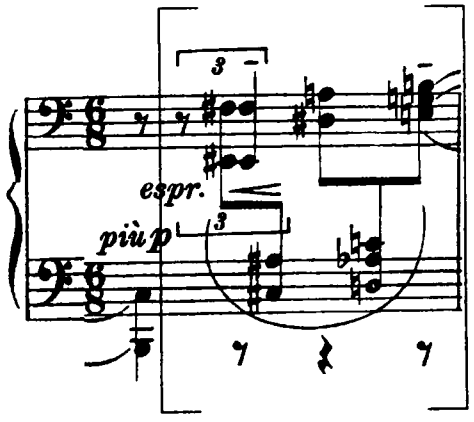
The $RT_e(P)$ transformation is interesting because the first and last chord of this row sound one half step higher than the original. The last chord also contains two of the same notes of the previous row. The C2 of the A minor chord and the last note of the repeating dyad, B2, are found in the last left-hand chord, only the B2 is played an octave lower.

The third row form, seen in Example 2.11, is presented in m. 7. It is the retrograde of the previous row, only transposed to begin on pc 5, like the row form before it. This row begins and ends on the same pcs as the row in m. 6.

Example 2.11

Measure 7 of "Simbolo"

$T_5(P)$ = <5-6-t-1-3-9-8-0-2-7-4-e>



[17] +13 refers to ordered "pitch interval 13." The ordered distance between B1 and C3 is 13 semitones. See Straus (2000: 8-9).

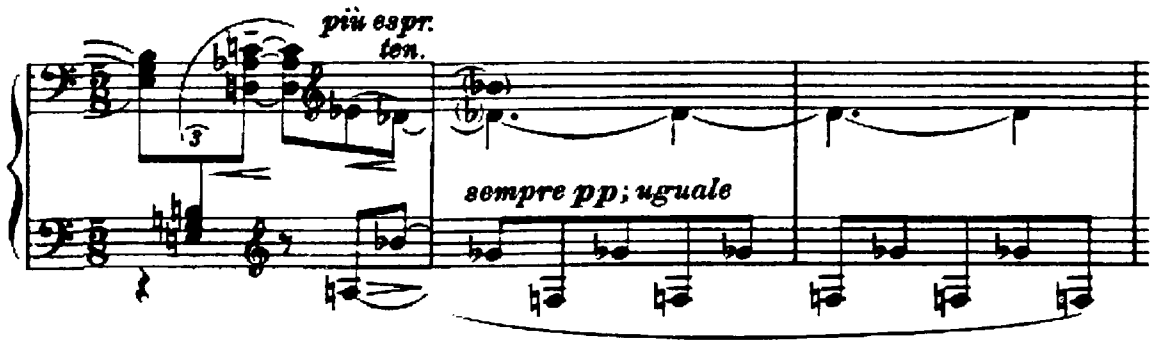
This row, $T_5(P)$ = <5-6-t-1-3-9-8-0-2-7-4-e>, realized on the musical surface as alternating high and low register eighth note chords, begins with an {E#2, F#3} dyad followed by a {A#3, C#3} dyad. The right hand returns with a {D#3, A3} dyad and is answered by {A♭3, C4, D3}, a possible $D^{\varnothing 7}$ chord. This $D^{\varnothing 7}$ chord with a missing third moves to the final chord of the row form, {E3, G3, B3}, or E minor in root position. In tonal music this is a typical progression but in serial music, triadic progressions are not the norm.

The next row form appears in mm. 8-10. Dallapiccola again uses the retrograde of the previous measure to link them together. Example 2.12 is the exact retrograde of m. 7, $RT_5(P)$ = <e-4-7-2-0-8-9-3-t-1-6-5>.

Example 2.12

Measure 8-10 "Simbolo"

$RT_5(P)$ = <e-4-7-2-0-8-9-3-1-t-6-5>



Dallapiccola's use of retrograde may well help the listener recognize the row. $RT_5(P)$ begins with an exact repetition of the E minor triad. This recurrence of the triad, using the same pitches, might well alert the listener for a possible return of previously heard material. The expectation is borne out, for the following chord is the aforementioned $D^{\emptyset 7}$ chord, also appearing with the same pitches as its last occurrence in m. 7. The next chord consists of A3, likewise using identical pitches, and E♭4, which is presented an octave higher than it was in the previous transformation. This idea is carried through to the next dyad, which also contains the same pcs as its previous row ordering, {B♭4, D♭4}, with each played an octave higher. The last dyad, {G♭4, F3}, begins a second repeating eighth note motive. The last dyad of the $RT_e(P)$ transformation in mm. 9-10 reminds the listener of the beginning of the movement. Though played in a higher register, the +13 is still familiar to the ear except that it is played *uguale*[17] rather than *staccatissimo*. By now, the listener may well be able to recognize the row.

2.3.3 Measures 11-14

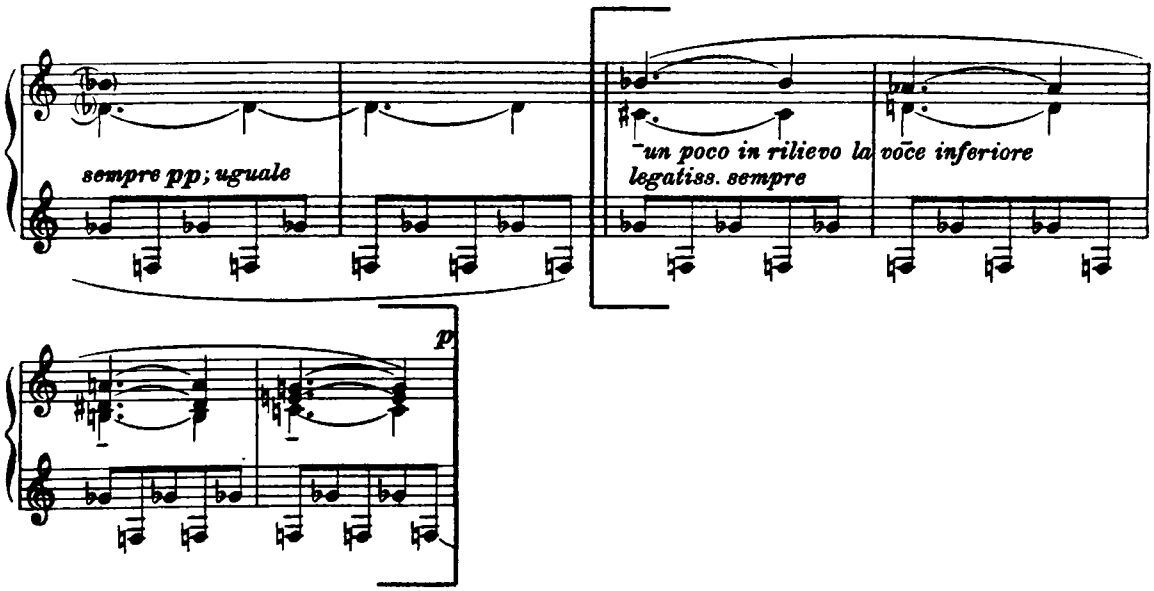
Dallapiccola begins a new series of row transformations in m. 11. This is again evident in the score with a change in style. The damper pedal is released and a new musical idea begins, indicated by the *legatissimo sempre* marking. A $T_6I(P)$ = <6-5-1-t-8-2-3-e-9-4-7-0> row form begins in m.11-14 with the repeating +13 dyad introduced in

[17] *Uguale* – equal, uniform.

m. 9, which continues throughout the left-hand bass line. This transformation suggests a return of the rhythmic motion of the introduction. This can be seen in Example 2.13.

Example 2.13

Measures 9-14 of "Simbolo"



Though no longer *staccatissimo*, the bass line is now played without the pedal and the right-hand voice returns with longer chords. The individual lines of the right hand consist of the aforementioned BACH motive and 2e2 line. The most important line of this transformation is the retrograde of the BACH motive. This voice, {C#4, D4, B3, C4}, is easily heard, for the performer is instructed to bring out the lowest notes of each right-hand chord.[19] The 2e2 line, {B♭4, A♭4, A4, G4}, returns in the uppermost part in

[19] The score reads, "*un poco in rilievo la voce inferiore.*"

inversion as e2e. The chromatic line, {C#4, D4, D#4, E4}, returns as an ascending line in retrograde.

The $T_6I(P)$ transformation is unusual because, though Dallapiccola was writing for his instrument, the stylistic markings are very unpianistic. It is not typical or idiomatic for the right-hand thumb to play louder than the fourth or fifth fingers. The *tenuto* markings on the retrograde BACH line makes the following section of the movement feel like an étude because the performer has to pay close attention to which notes receive more stress.

The $T_6I(P)$ row form overlaps with $RT_5(P)$ of m. 8. The last four pcs of $RT_5(P)$ and the first four pcs of $T_6I(P)$ are identical. Dallapiccola uses invariance to connect these two rows. When $RT_5(P)$ = <e-4-7-2-0-8-9-3-t-1-6-5> is paired, note-against-note, with $T_6I(P)$ = <6-5-1-t-8-2-3-e-9-4-7-0>, the four aforementioned pcs map onto themselves. The pcs in the first four order positions then occupy the last four order positions. The pcs 4 and 7, which occur side-by-side, and against sc 4-20 (0158), also map onto each other through $RT_5(P)$ and $T_6I(P)$. This is seen in Example 2.14.

Example 2.14

Invariant Relationship between $RT_5(P)$ and $T_6I(P)$

The underlined pcs indicate sc 4-20 (0158) and the <4, 7> dyad

									sc 4-20			
$RT_5(P)$ = <e	4	7	2	0	8	9	3	t	1	6	5>
$T_6I(P)$ = <6	5	1	t	8	2	3	e	9	4	7	0>
	sc 4-20											

In addition to the use of invariants, these row forms are also related by hexachordal combinatoriality. $RT_5(P)$ can be divided into two hexachords, {e-4-7-2-0-8} and {9-3-t-1-6-5}. $T_6I(P)$ is likewise divided into hexachords {6-5-1-t-8-2} and {3-e-9-4-7-0}. As seen in Example 2.15, the first hexachord of $RT_5(P)$ and the second hexachord of $T_6I(P)$ are related by retrograde-inversional combinatoriality.

Example 2.15

The underlined hexachords are related by RI.

$RT_5(P)$= [e47208] [93t165]

$T_6I(P)$ = [651t82] [3e9470]

These invariants and combinatorial hexachords are important because they help the listener in finding the aural similarities between $RT_5(P)$ and $T_6I(P)$. The harmonic rhythm and the repeating, motivic dyad have returned, but the related hexachords and repetition of the pitches {1, 5, 6, t} are aurally perceivable. These pitches also provide tonal references because the pcs are members of sc 4-20 (0158), which embeds both major and minor triads.

2.3.4 Measures 15-16

The next row form appears in m. 15 with another change in texture. It begins with the repeating <5, 6> dyad in the left hand from the previous four measures, tied over the bar line. Rather than continuing as the melodic rhythmic motive, the dyad is now

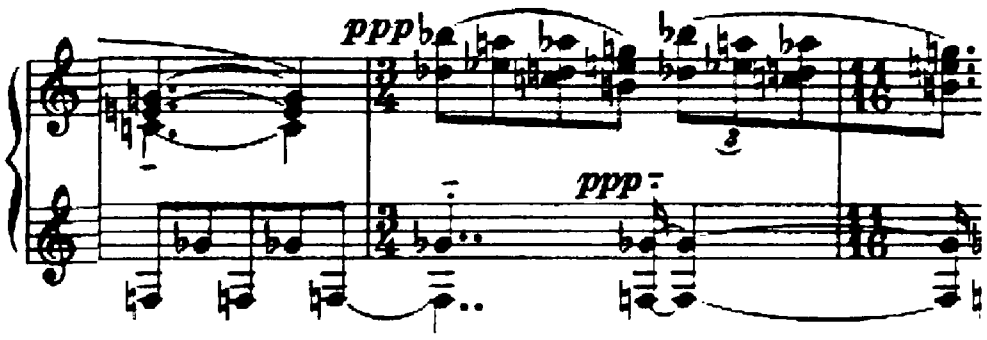
sustained. However, the rhythmic motion is not lost, for the left-hand voice continues the movement of the eighth notes in chords above the long sustained dyad in the right hand. The eighth note rhythm is interrupted by an eighth-note triplet at the end of the measure with a return of the same pcs in the same register. This can be seen in Example 2.16.

Example 2.16

Measures 14-15 of "Simbolo"

Row of Measure 15: $T_5(P)$ = <5-6-t-1-3-9-8-0-2-7-4-e>

Note how the <5, 6> dyad appears melodically at the end of m. 14
and harmonically at the beginning of m. 15



This row form, $T_5(P)$ = <5-6-t-1-3-9-8-0-2-7-4-e>, continues to support the BACH motive, the 2e2 line, and the descending chromatic line introduced in the first five measures. The descending chromatic line appears in the uppermost voice of the right hand with the notes <B♭5, A5, A♮5, G5>. The 2e2 line is realized by the notes <D♭5, E♭5, D5, E5>. The BACH line, which is transposed "to its 'correct' pitch-class level,"[20]

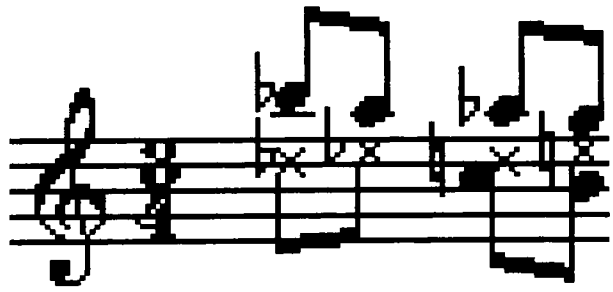
[20] Lewin (1993: 6).

is obscured by octave displacement in this transformation. The line appears as <B♭5, A5, C5, B♮4>. Example 2.17 shows only the right-hand part of the first two beats of m. 15. The 2e2 line is stemmed downward with x-shaped noteheads, the descending chromatic line is stemmed upward, and the remaining notes compose the BACH line.

Example 2.17

Measure 15 of "Simbolo" – RH part only

The 2e2 line (D♭-E♭-D♮-E♮) is stemmed downward with x-shaped noteheads.
The descending chromatic line (B♭-A-A♭-G) is stemmed upward.
The BACH line (B♭-A-C-B♮) is stemmed
both upward on beat 1 and downward on beat two.



The entire $T_5(P)$ row form is repeated beginning with the eighth note triplet on the third beat of m. 15 and ending on beat one of the following measure, all played over the <5, 6> dyad. Dallapiccola likely chose this row because, like the previous two rows, the last four pcs of $RT_5(P)$ and the first four pcs of $T_6I(P)$ and $T_5(P)$ are identical. The pcs

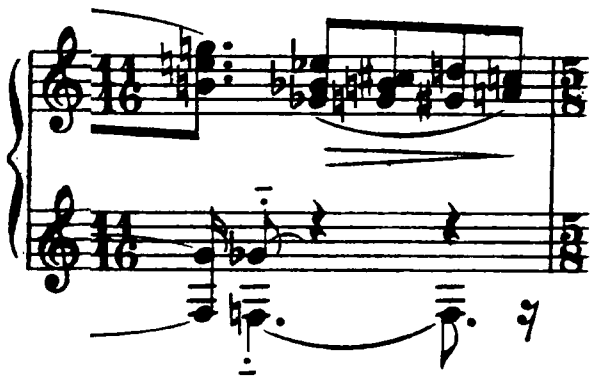
{1,5,6,t}, which form a member of sc 4-20 (0158), link the three rows. Set class 4-20 (0158) provides a tonal reference in the B♭ (or A#) minor triad using the pcs 1, 5, and t.

Measure 16 begins a new row form on the second chord of the right hand. It sounds like the previous row due to the fact that it is the T_{11} retrograde of the row form in m. 15. The row is labeled $RT_4(P)$ = <t-3-6-1-e-7-8-2-0-9-5-4>. It begins with an {E♭5, G♭4, B♭4} chord, followed by {C#5, G4, B4}, {D5, G#4}, and {C5, A4} all played over the same <5, 6> dyad in the bass line. This can be seen in Example 2.18.

Example 2.18

Measure 16 of "Simbolo"

$RT_4(P)$ = <t-3-6-1-e-7-8-2-0-9-5-4>



These chords sound similar to each other because the three right-hand motives are preserved in the row form. The BACH line is present in retrograde using the pitches <B♭4 B♮4,G#4,A4>. The 2e2 line is still heard in the highest voice of the right-hand

with the pitches <E♭5, C#5, D5, C♮5>. The descending chromatic line, now ascending as a result of the R_4 transformation, consists of the notes <G♭4, G♮4, G#4, A4> in the lowest right-hand voice. The F3 of the <5, 6> dyad and the E4 in the left-hand part of m. 17 complete this row form. Though this marks the end of the A section, the overlapping of the $RT_4(P)$ row into the beginning of the following measure helps link the two sections.

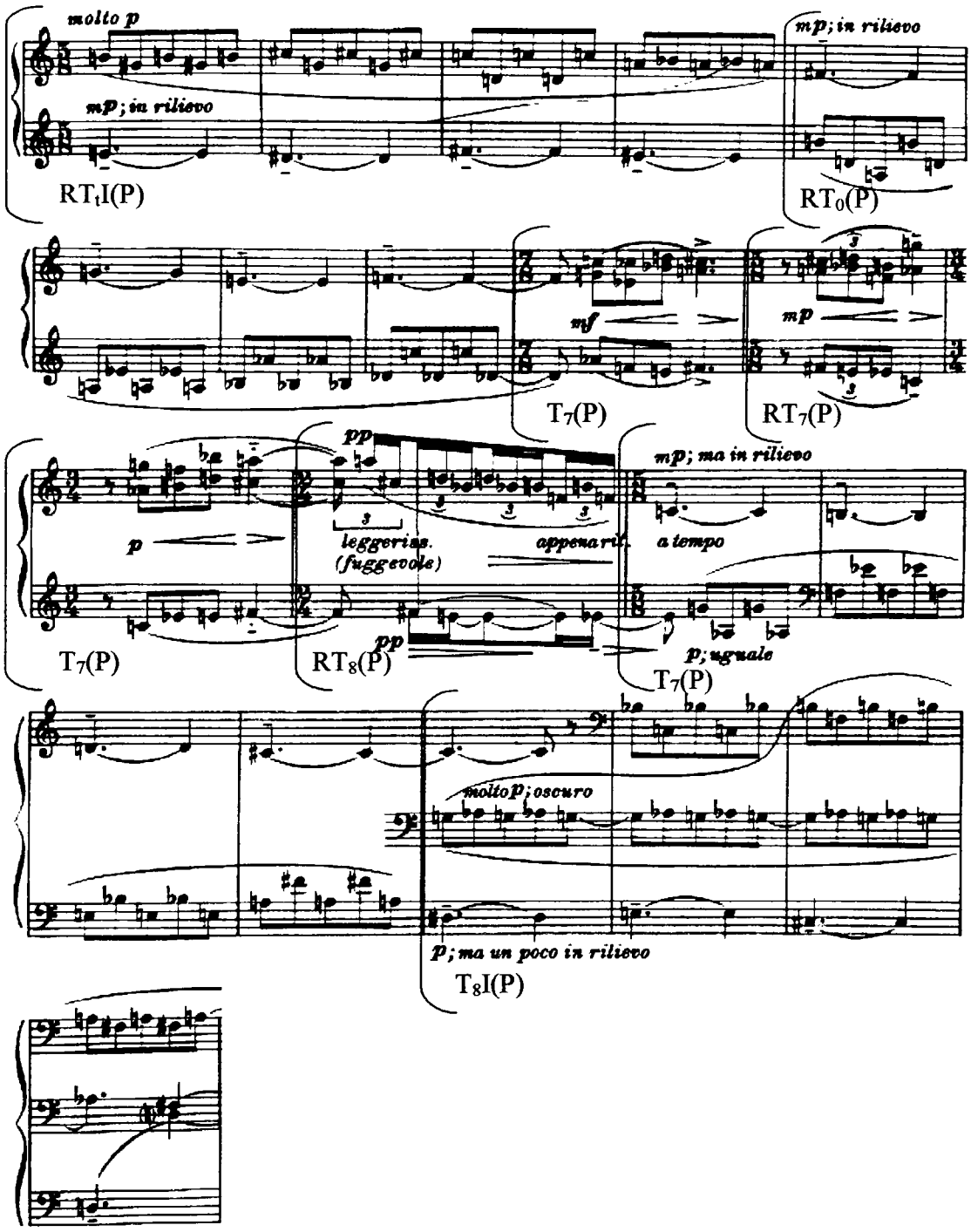
2.4 Measures 17-36

The B section of "Simbolo" is likewise divided into smaller subsections. The listener first notices an increase in tempo from M.M. 84 to M.M. 92-96. It begins with long tones played *in rilievo* against a right-hand arpeggiated accompaniment in mm. 17-24. Measures 25-29 provide the climax of the movement and mm. 29-36 return to the single line accompanied by moving eighth notes in the right-hand line. Section 2.4 is divided into three sections. Section 2.4.1 provides an analysis of mm. 17-24. This section also considers the invariant pairs of pcs that link the end of the A and B sections together. Section 2.4.2 provides an analysis of mm. 25-29 and Section 2.4.3 brings the B section to a close in mm. 29-36. Example 2.19 labels the row forms found in mm. 17-36.

Example 2.19

Section B of "Simbolo" – Measures 17-36

Bracketed sections indicate the row forms.



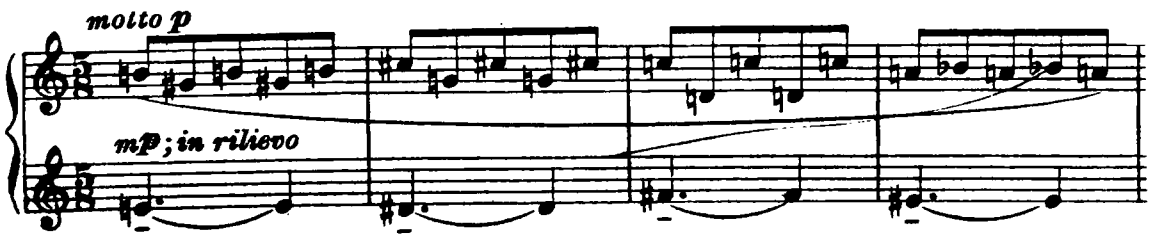
2.4.1 Measures 17-24

Measures 17-24 provide two four-measure orderings of the row. Measure 17, which ushers in the B section of the movement, is indicated in the score by both changes in tempo and style. The measure begins in 5/8 with a clear presentation of the BACH motive. Played by the left-hand *in rilievo* and louder than the right-hand line, the listener is reminded of the beginning of the movement. The texture is now thinner and this left-hand line is heard at T_{+13} of the original. The four-measure row form, as seen in Example 2.20, unfolds in the right-hand voice with repeating dyads of different intervals.

Example 2.20

Measures 17-20 of "Simbolo"

$RT_tI(P)$ = <4-e-8-1-3-7-6-0-2-5-9-t>



The first dyad in m. 17, <B4 and G#4>, forms an ic3. The next measure consists of an ic6 dyad, <C#5, G4>. The third measure of the transformation, m. 19, has an ic2 dyad built on C5 and D4. Measure 20 contains an ic1 dyad, <A4, B♭4>. This row ordering, $RT_tI(P)$ = <4-e-8-1-3-7-6-0-2-5-9-t>, shares pc 4 with the previous $RT_4(P)$

transformation. Dallapiccola connects this transformation with the previous by making use of the fact that $RT_tI(P)$ and $RT_4(P)$ begin and end with the same pcs.

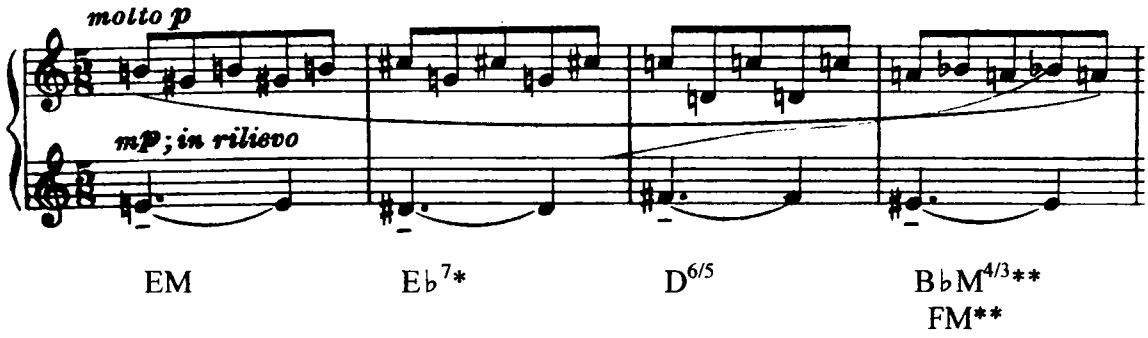
While the listener may or may not hear the retention of pc 4, he or she may hear tonal references. Measure 17 begins with an easy-to-hear E major triad in root position. The right-hand line sounds very similar to the arpeggiated accompanying lines of the mid-eighteenth century. The texture of mm. 17-24 reminds the listener of this earlier period because the left-hand line is composed of long *sostenuto* chords that are accompanied by a rhythmic "Alberti-style" right-hand line. These repeating dyads recall the "stereotyped figures of accompaniment for the left-hand in keyboard music consisting of broken chords."[21]

Following the E major triad in m. 17, the E moves down by one semitone to an E♭7 chord (D# and C# enharmonically spelled E♭ and D♭) in m. 18. The seventh of the chord resolves down correctly by half step to a C♮ in m. 19 to a D7 chord. The final chord of the row form is a $B♭M^{4/3}$ (with a missing third and an enharmonically spelled E#) in m. 20. This chord can also be interpreted as an F major triad with a missing fifth if one acknowledges the B♭ sounding as an upper neighbor. All of these chords are quite easy to hear, for they all occur in close position. This is shown in Example 2.21.

[21] Randel (1978: 11).

Example 2.21

Measures 17-20 of "Simbolo"



* The E♭ and D♭ are enharmonically spelled as D# and C#

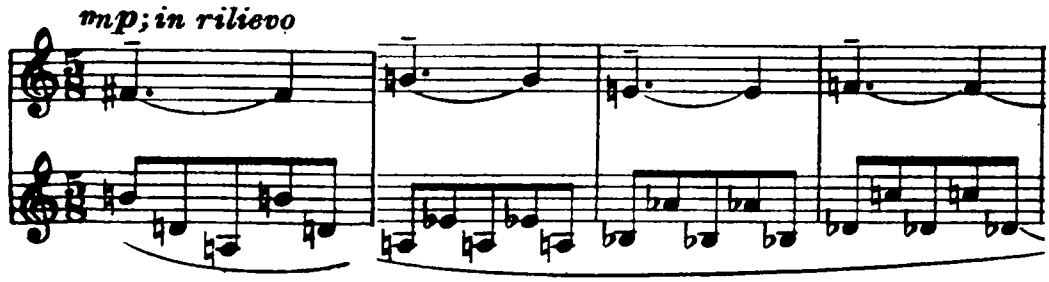
** The F is enharmonically spelled as E#

The next row form, $RT_0(P)$ = <6-e-2-9-7-3-4-t-8-5-1-0>, begins in m. 21. $RT_0(P)$ in mm. 21-24 continues the new style and texture introduced by the tempo change in m. 17. Though the right and left hands switch parts, the musical line remains the same to the ear. The BACH line, appearing in retrograde, is played *in rilievo*. By now, the listener recognizes this motive in almost any row form due to its frequent appearance. Found only one semitone higher in both position and octave, this motive continues to aurally link the various rows together. This ordering of the row can be seen in Example 2.22.

Example 2.22

Measures 21-24 of "Simbolo"

$RT_0(P)$ = <6-e-2-9-7-3-4-t-8-5-1-0>

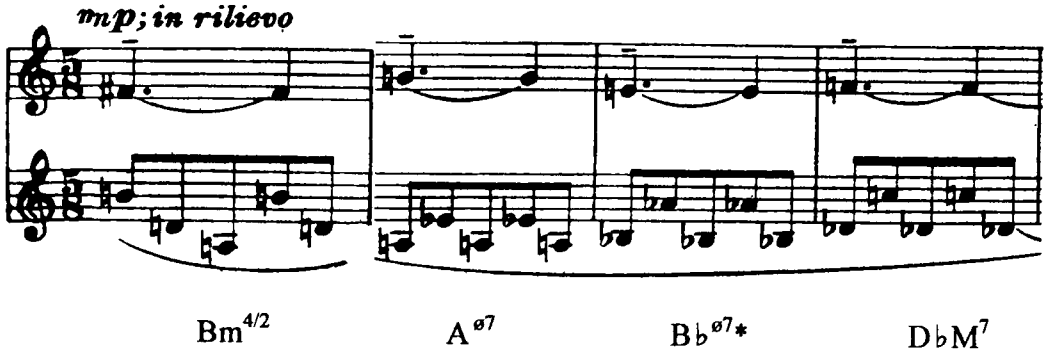


The BACH motive, consisting of the notes <F#4-G4-E4-F4>, is accompanied by three notes rather than two in m. 21. These notes, {D4-A3-D4}, are then followed by the dyad <A3, E♭4>. Measure 23 accompanies the BACH line with the <B♭3-A♭4> dyad and the left-hand line of m. 24 consists of the notes D♭4 and C5.

The row form in mm. 21-24, like the previous transformations, embodies many tonal references. These tonal references can be seen in Example 2.23. The chord in m. 21 can be understood as a $Bm^{4/3}$. This is easy to hear because it appears in fairly close position and is only one half step higher than the final chord of the previous row form. The following measure consists of an $A^{ø7}$, which promptly moves up one semitone to a $B♭^{ø7}$ chord (F♭ enharmonically spelled E♮) in m. 23. Every pitch of the latter chord is one semitone higher than the previous. The final chord of the transformation can be heard as a $D♭M^7$ chord with a missing fifth.

Example 2.23

Measures 21-24 of "Simbolo"



* The F♭ is enharmonically spelled as E♮

2.4.2 Measures 25-29

Measures 25-29 provide the climax of the movement. Upon reaching the highest loudest point in the movement, the music releases its built-up tension and heads towards resolution. Measure 25 begins with a time signature change to 7/8, followed by changes to 5/8, 3/4, and 2/4, respectively. This recalls the outset of the A section with the time signature changes from 7/8 to 6/8, and then to 5/8, in mm. 6-8. The arpeggiated bass accompaniment, present in mm. 17-24, ceases and is replaced by moving eighth-note chords in both hands.

Measure 25 introduces the row form $T_7(P)$ = <7-8-0-3-5-e-t-2-4-9-6-1>. This is seen in Example 2.24. This measure marks the ascent to the movement's climax with an increase in dynamics to *mezzo forte*. The row begins on the second eighth note of the measure with {C4, G4, A♭4} followed by {E♭4, E4, C♭5}. The pitches {D5, E4, B♭5}

make up the third chord and the final chord of the row consists of the pitches {C#5, F#4, A4}. Only the final chord of the transformation sounds longer than the previous. This chord is written as a dotted quarter rather than an eighth note.

Example 2.24

Measure 25 of "Simbolo"

$T_7(P)$ = <7-8-0-3-5-e-t-2-4-9-6-1>

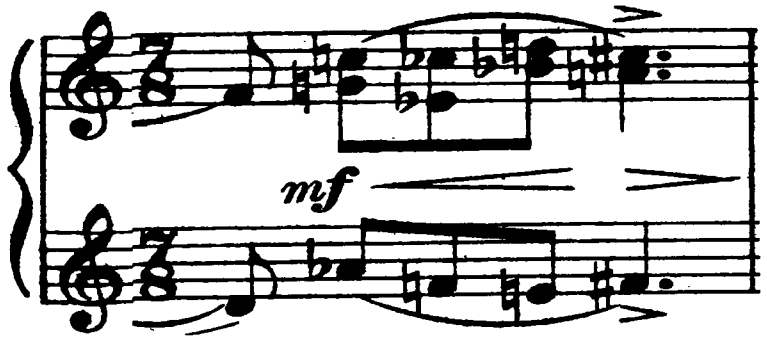
All of the aforementioned motives and individual lines are present in this row form. The BACH motive transposed by T_2 to begin on C appears with the pitches <C5, B4, D5, C#5>. The chromatic descending line is present as well, beginning with the C5 and B4 the BACH motive and continuing down to the in the notes B♭4 and A4. The 2e2 line is also present, beginning with the E♭4 in the right-hand part and moving to the left-hand part for the F4, E4, and F#4. This line is more difficult to hear since the E♭ and F sound at the same time, marking m. 25 as the first appearance of the 2e2 motive in this fashion. The G4 and A♭4 sound together and are followed by B♭4 and A4. These final

four pcs complete the row. The latter two lines, unlike the chromatic line or BACH motive, are difficult to hear because they do not appear as individual lines. Instead they occur both harmonically and melodically, which makes these voices difficult to decipher.

Tonal references are seen in this measure beginning with the first chord. An example of this can be seen in Example 2.25. The {C5, G4, A♭4}, can be understood as an $A\flat M^{4/2}$ chord with a missing fifth, moves to an $F^{\varnothing 4/2}$ and then to an $E^{\varnothing 7}$. The latter two chords each lack a third but all three chords are easy to hear because they are played in close position. Every chord of this row ordering grows louder, with the loudest chord being the final F# minor triad. Stacked in thirds, this triadic harmony resounds for the length of a dotted quarter note and is followed by an eighth rest. This is important because the same pattern occurs in the next measure as well, alerting the listener to the opening section of the climax.

Example 2.25

Measure 25 of "Simbolo"



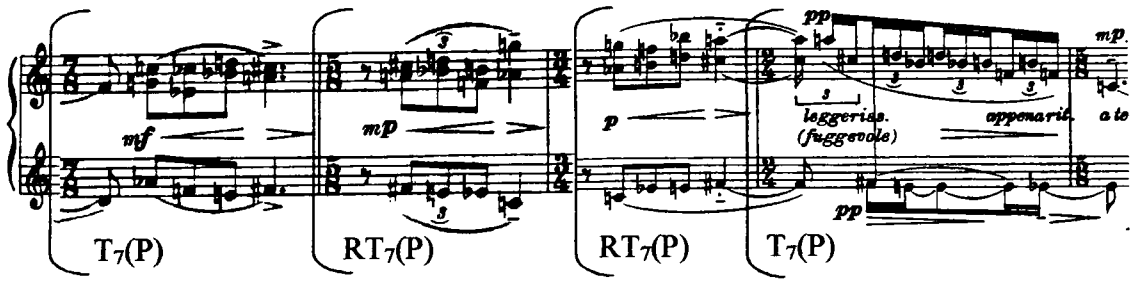
$A\flat M^{4/2}$ $F^{\varnothing 4/2}$ $E^{\varnothing 7}$ F#m

The next three measures, mm. 26-28, are based upon this same row form. Measure 26 is the retrograde of the previous measure $RT_7(P)$ = <1-6-9-4-2-t-e-5-3-0-8-7>. The first chord is an exact repeat of the final chord in m. 25, appearing in the same octave and voicing. The next three chords share the same "tonal" properties as the previous measure, only in retrograde, but many of the pcs appear in different octaves, though still in close position. Measure 27 can be analyzed in the same way. Both mm. 25 and 27 share the same row form, $T_7(P)$ = <7-8-0-3-5-e-t-2-4-9-6-1>. As in m. 25 and 26, the chords share the same labels but the pcs appear in close position and in different octaves. Measure 28 shares the same row form as m. 26, $RT_7(P)$ = <1-6-9-4-2-t-e-5-3-0-8-7>. This row also appears as the retrograde of the previous measure, but with one difference: the last two pcs of $RT_7(P)$ are switched. In this transformation, pc 7 comes before pc 8. The tonal references and similarities between the row forms in mm. 25-28 can be seen in Example 2.26.

Example 2.26

Measures 25-28 of "Simbolo"

Measure 25 – $T_7(P)$ = <7-8-0-3-5-e-t-2-4-9-6-1>
Measure 26 – $RT_7(P)$ = <1-6-9-4-2-t-e-5-3-0-8-7>
Measure 27 – $T_7(P)$ = <7-8-0-3-5-e-t-2-4-9-6-1>
Measure 28 – $RT_7(P)$ = <1-6-9-4-2-t-e-5-3-0-8-7>



Measures 25-28 provide the climax of the movement. This is the only section of the movement that begins *mezzo forte*; the rest of the movement in much softer. This alerts the listener to pay closer attention to the change about to occur. The row forms then repeat forward and backward against each other. Finally, in m. 27, "the climax on B♭5–A5 audibly recalls the earlier mobility on B♭ that culminated at m. 15 on B♭–A5. B♭5 remains the highest note of the piece."[21] The following measure likewise signals a change to the listener because it provides the fastest harmonic rhythm of the movement. Measure 28 moves downward in sixteenth note triplets from an A5 to an E♭4, slowing to an *appena ritardando*. The row form ends in m. 29 on a right-hand *sostenuto* C4 accompanied by a repeating <G4, A♭3> dyad in the left hand.

2.4.3 Measures 29-37

Measure 29, which serves as the final measure of the previous row form, also begins the following row form. This four measure row, $T_7(P)$ = <7-8-0-3-5-e-t-2-4-9-6-1>, likewise serves as the retrograde of the previous transformation. Though the climactic material has since passed, the listener should be aware that there is still more to come before the movement's end. This continual repeat of $T_7(P)$ and its retrograde sends a signal that a return of the A section, or a possible C section is about to occur.

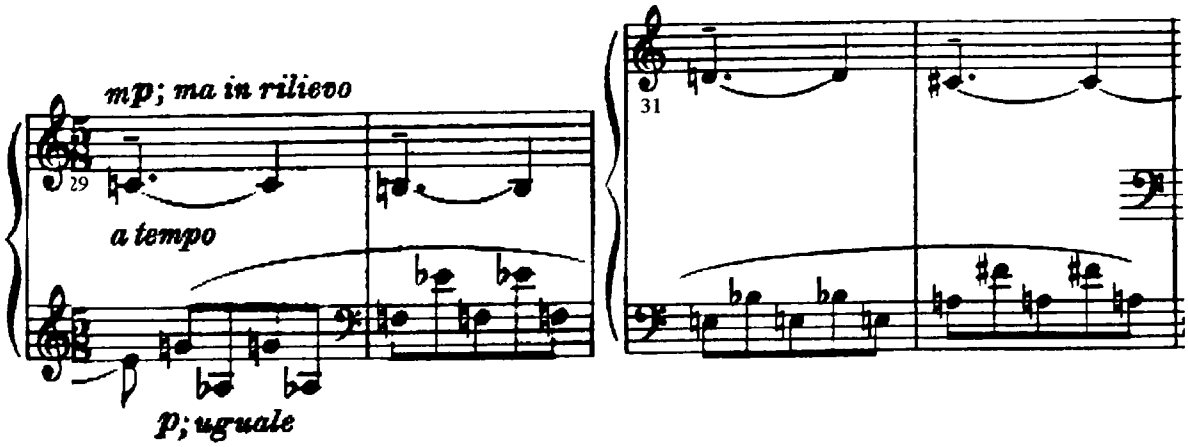
[21] Lewin (1993: 11).

Example 2.27 shows the row ordering and tonal references in mm. 29-32. Once again, the BACH motive is present in mm. 29-32. Transposed from the original <B♭, A, C, B♮> to begin on C, the motive appears one octave lower than it did in m. 25. Appearing *ma in rilievo* in the right hand and *uguale* in the left hand, these four measures closely resemble mm. 17-20. Tonal references appear in m. with the A♭M^7 chord. Resembling the "harmonic progressions" of the previous four measures, mm. 30-31 can be analyzed as an F ^{ø7} and an E ^{ø7}, respectively. Measure 32 provides an F# minor chord in first inversion.

Example 2.27

Measures 29-32 of "Simbolo"

$T_7(P)$ = <7-8-0-3-5-e-t-2-4-9-6-1>



A♭M^7 F^{ø7}* E^{ø7} F#m$^{6/3}$

* The A♭ is missing and the C♭ is enharmonically spelled as B♮

Measures 33-37 provide the ending material for the B section. The listener, who now may well be able to recognize both $T_7(P)$ and $RT_7(P)$, may be puzzled by the $T_8I(P)$ = <8-7-3-0-t-4-5-1-e-6-9-2> beginning in m. 33. These row forms are related by the invariant pairs, {7, 8} and {6, 9}. Other pairs and pcs would share invariance except for that fact that the $T_8I(P)$ row form actually appears in the order <3-7-8-4-t-0-1-e-5-2-9-6>. $T_8I(P)$ is also related to $T_7(P)$ in that they share the first four pcs, {0,3,7,8}, the first three of which can be recognized as a minor triad.

The performer notices a difference in the score with the addition of a third staff in m. 33. Suddenly the right and left hands are to hold long *sostenuto* chords and simultaneously play repeating eighth note dyads. The long *sostenuto* chords provide the BACH motive, appearing in retrograde. This line, consisting of the notes <D#3-E3-C#3-D♮3>, is played in the left hand while the right hand takes over the two remaining staves. Only in m. 33 does the left hand take both the top and bottom staves, leaving the right hand with the middle staff.

This middle staff of mm. 33-35 comprises the repeating eighth note dyad <G3-A♭3>, which breaks the harmonic rhythm to tie the last note of every measure across the bar line, save for m. 35. The top staff crosses above and below the middle staff with measures of repeating eighth note dyads. Beginning in m. 34, these dyads are <B♭3-C3>, <B♮3-F3>, and <A3-F#3>, respectively.

Example 2.28 shows the row form of mm. 33-37. Tonal references are more difficult to hear in the realization, but are present nonetheless. Measure 33 can be

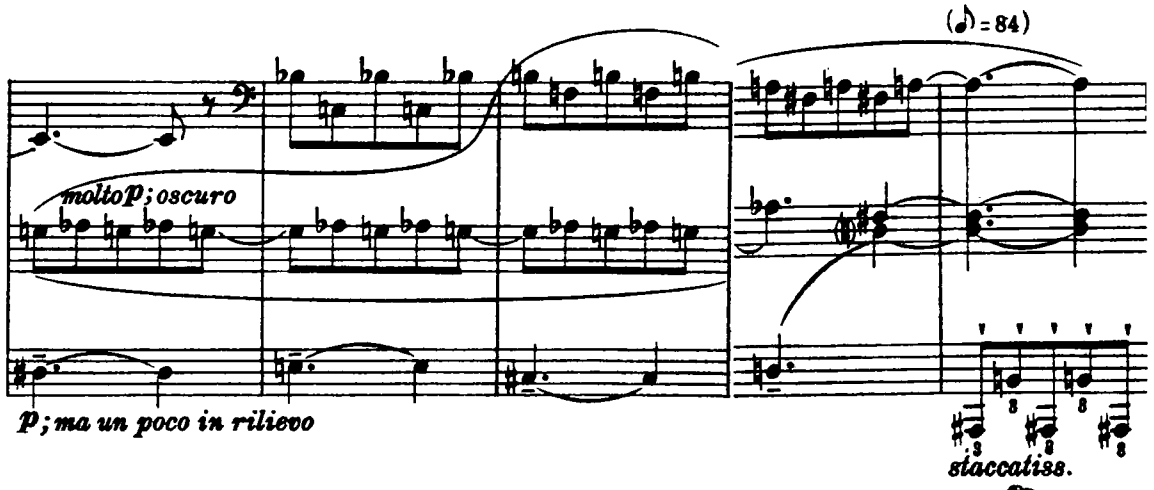
understood as an $A\flat M^{4/3}$ chord.[22] This chord then moves to C^7 embellished by a neighboring $A\flat$. Measure 35 provides a $C\#^7$ chord (the F and $A\flat$ are enharmonically spelled E# and G#) with the G acting as a lower neighbor to the $A\flat$ (enharmonic G#) and the final measure of the $T_8I(P)$ row ordering in m. 36 provides a D major triad in root position and stacked in thirds. The triadic quality of the chord is unmistakable, and it is held through the following measure, which links it to the next section.

Example 2.28

Measures 33-37 of "Simbolo"

$T_8I(P)$ = <8-7-3-0-t-4-5-1-e-6-9-2>

(Bottom two staves begin in bass clef; upper staff begins in treble clef)



$A\flat M^{4/3}$ C^7 $C\#^7$ DM

($Cm^6/E\flat M$)

[22] Hearing the $A\flat$ as an upper neighbor to G, this chord can likewise be interpreted as a first-inversion C minor triad or an $E\flat$ major triad with a missing fifth.

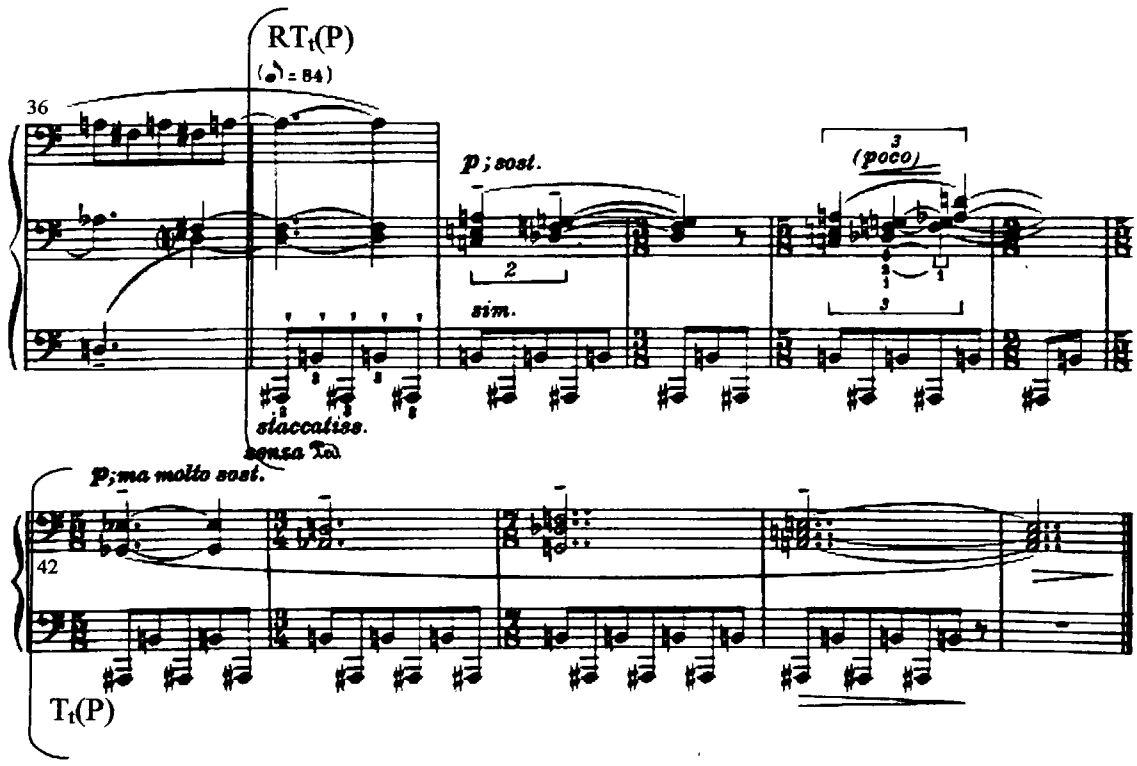
2.5 Measures 37-46

Measures 37-46 return to the A section before the close of "Simbolo." While the listener will perceive the A^1 section as closely related to the A section, there are a few minor differences. Section 2.5 is divided into two areas, labeled by the section number followed by numbers 1-2. Section 2.5.1 provides an analysis of mm. 37-42 and Section 2.5.2 discusses mm. 42 to the end. Example 2.29 labels the row orderings found in mm. 37-46.

Example 2.29

Section A_1 of "Simbolo" – Measures 36-46

Bracketed sections indicate the row forms.



2.5.1 Measures 37-42

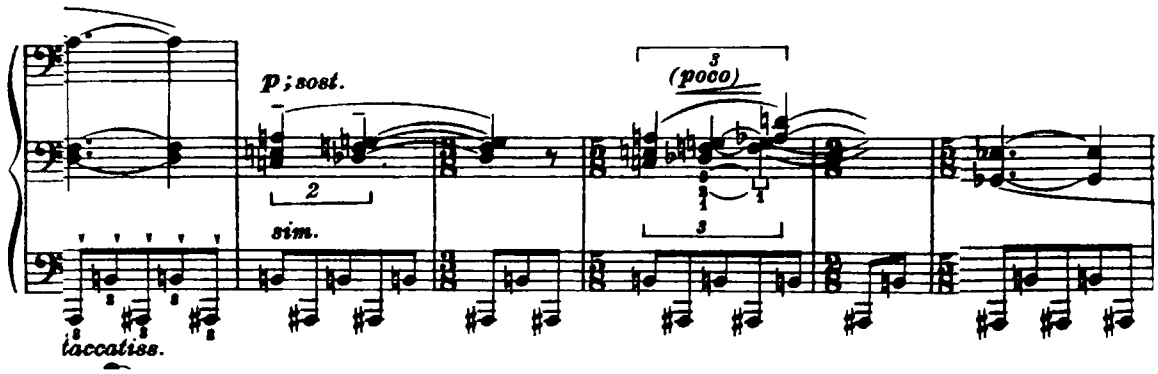
Measure 37 marks the beginning of the final section of the movement. This is indicated in the score by a return to the original tempo. There is also a return to the original <A#1-B2> dyad in the left-hand line. The next row form, $RT_t(P)$ = <4-9-0-7-5-1-2-8-6-3-e-t>, begins in m. 38. The left hand plays the repeating dyad of eighth notes carried over from the previous measure. The right-hand line consists of chords of varying duration. The first chord {C3, E3, A3} can be understood as an A minor triad in first inversion. This then moves to a $G^{\varnothing 7}$ using the enharmonically spelled A# in the left-hand part. These two chords divide the 5/8 measure directly in half but the latter chord is tied over to the following measure.

Measures 37-42 can be seen in Example 2.30. Measure 40 begins with a repeat of the first two chords of the row form. This is audible because both chords in this measure appear in both the same position and octave. Rather than appearing as two chords equally dividing the 5/8 measure, the chords in question divide the measure into three chords of equal length. The second $G^{\varnothing 7}$ chord is tied across to the third chord, which adds the notes A♭3 and D4. This chord is likewise carried across to the next measure. The $RT_t(P)$ row from ends in m. 42 with the {E♭3, G♭3} in the right hand line, continuing to be accompanied by the <A#1-B♮2> dyad.

Example 2.30

Measures 37-42 of "Simbolo"

$RT_t(P)$ = <4-9-0-7-5-1-2-8-6-3-e-t> – Beginning in m. 38



2.5.2 Measures 42-end

Measure 42 introduces the final row of "Simbolo," while completing the previous ordering. The row, $T_t(P)$ = <t-e-3-6-8-2-1-5-7-0-9-4>, ties the movement together. It is not only the retrograde of the previous row but it is also the same ordering as the opening row form of the movement. The listener may well hear the similarity between the first and last row orderings of "Simbolo." The same <A#1-B♮2> dyad appears in the left-hand line and the right hand chords appear in both the same position and octave. The only difference is in their lengths.

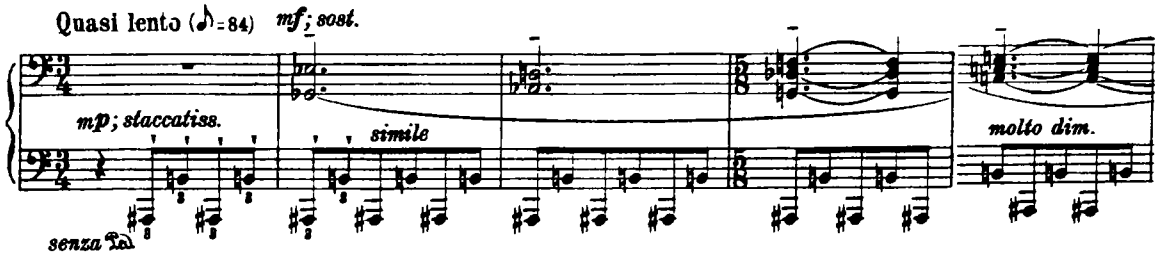
The {E♭3, G♭2} in m. 42 is held for the duration of a 5/8 bar rather than a 3/4 bar. Each of the {D3, A♭2} chords are held the length of a 3/4 measure. The {D♭3, F3, G2} chord in m. 44 is held the duration of a 7/8 bar rather than that of a 3/4 measure. The final A minor chord of the movement sounds for two 7/8 measures, unlike the first

appearance in m. 5, which lasted a quarter note longer than a 5/8 bar. Example 2.31 shows the comparison in length between the first and final row form.

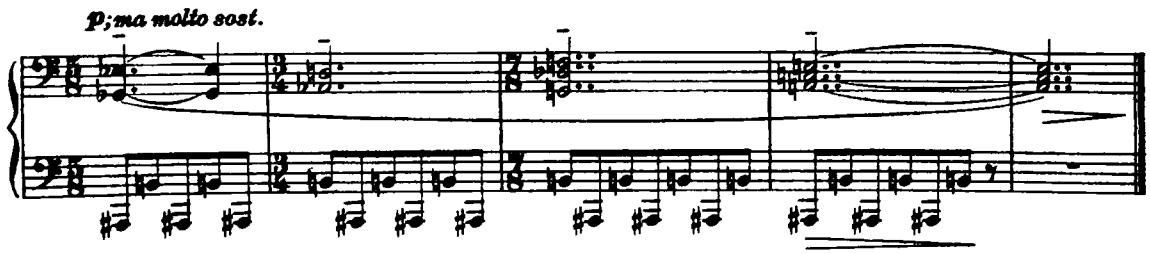
Example 2.31

Similarities Between mm. 1-5 and mm. 42-end

Measures 1-5



Measures 42-end



2.6 Conclusion

While "Simbolo" ends beautifully on paper with a return of the original Tt(P) row, the resolution is not so obvious to the listener. Because the *sostenuto* BACH line, the 2e2 motive, and the descending chromatic line continue holding past the repeating

eighth note dyad, the audience may be left in a state of confusion. This lack of closure is unsettling but the anticipation of the remaining movements leaves the audience on edge. With this, Dallapiccola sets the stage for the next movement, "Accenti."

CHAPTER III

ANALYSIS OF MOVEMENT NO. 7: "ANDANTINO AMOROSO E CONTRAPUNCTUS TERTIUS – RESOLUTIO"

Chapter III provides an analysis of no. 7, "Andantino Amoroso e Contrapunctus Tertius."[1] Section 3.1 gives a brief introduction and an overview of the piece's row. Section 3.2 describes the movement's form. Analyses of tonal references and serial transformations are provided in Sections 3.3-3.4. Section 3.5 provides a conclusion.

3.1 Introduction

"Andantino Amoroso" is the final contrapuntal movement of the *Quaderno Musicale di Annalibera.* Like the preceding movements, "Andantino Amoroso" has a light, serene quality. The movement's possible introspective feel may leave some listeners in a meditative state. One finds oneself dreaming or simply resting with carefree thought. The dynamic level is very soft and the canonic entrances are smooth and gentle. There is nothing abrupt or strident about this movement. It is simply relaxing and soothing to the ear.

This movement also shares the similar warm and expressive quality established by the prior contrapuntal movements. Additionally, the seventh movement is comparable to "Contrapunctus Primus" and "Contrapunctus Secundus," as noted by the title, due to

[1] The title is referred to as "Andantino Amoroso" for the remainder of Chapter III.

canonic texture that the three movements have in common. "Andantino Amoroso" is particularly interesting because of its crab canon construction. According to Terry Barfoot, "nowhere is Dallapiccola's love and understanding of canonic devices heard to better effect."[2] The canon's subject first appears in red at the top of the movement's page. It is then followed by the crab canon, entitled "Resolutio," which copies the original subject verbatim and then repeats against the retrograde of the subject. An example of this layout (in black and white) is seen in Example 3.1. In a crab canon, "an entire passage of chords may be stated backwards until the original chord reappears. Retrogressive progressions bring new meaning to the original harmonic statement."[3]

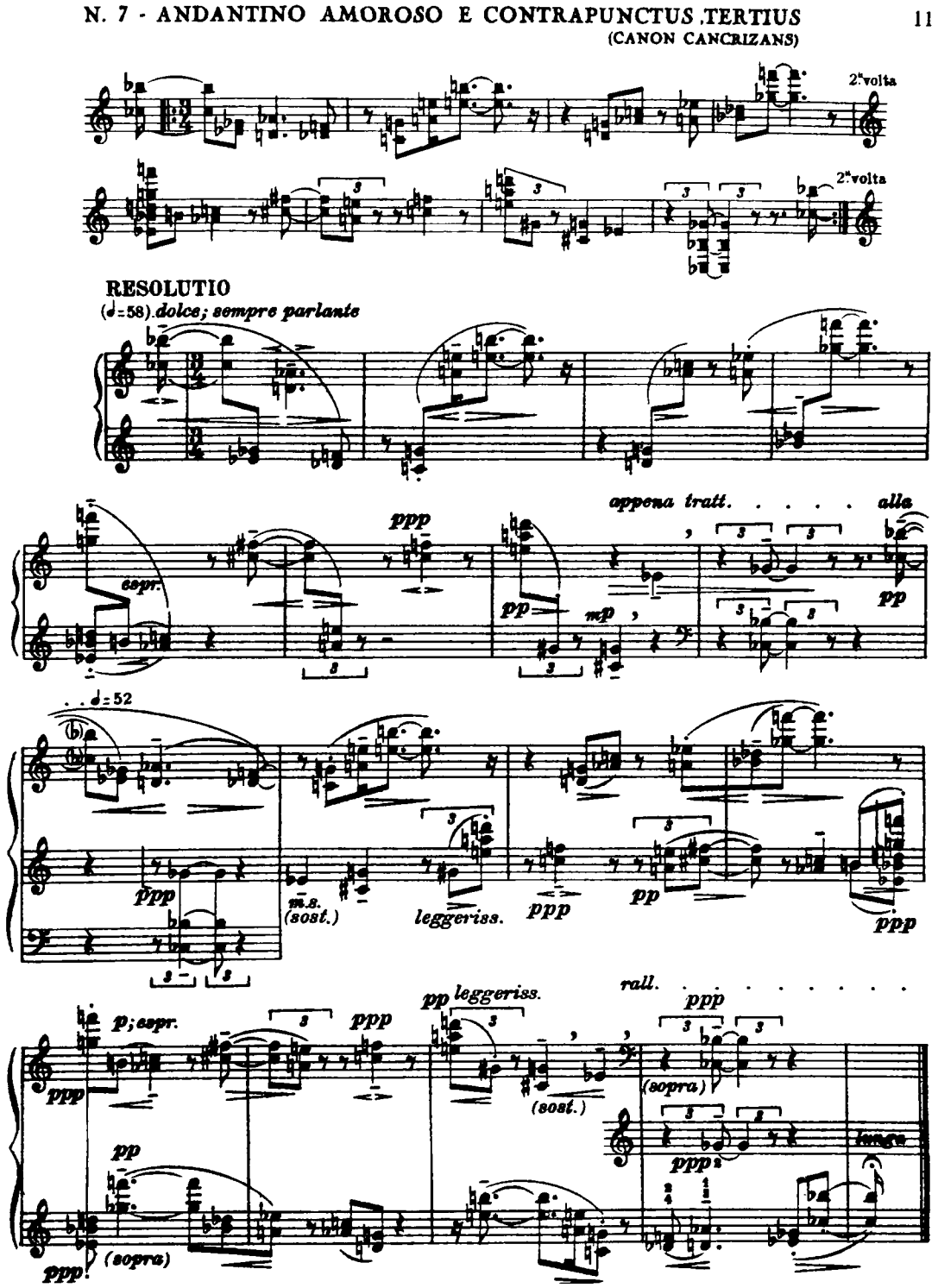
"Andantino Amoroso" may remind the listener of both "Simbolo" and "Contrapunctus Primus." Movement seven begins with the same $T_t(P)$ row transformation as "Simbolo," but realized with different pitches. Even though several movements have passed, the listener may well hear the similarity in sound. "Andantino Amoroso" is also aurally similar to "Contrapunctus Primus" in that they are both very slow and lyrical. The row realization beginning each of the two movements helps

[2] Barfoot (1998: 1).

[3] Persichetti (1961: 187).

Example 3.1

Edizioni Suvini Zerboni layout of no. 7 – "Andantino Amoroso e Contrapunctus Tertius"



establish this similarity as well since the first row in no. 3 is $T_e(P)$ and no. 7 begins with $T_f(P)$. This similarity is aurally discernable due to the fact that both rows appear in the same register as each other. The latter begins exactly one semitone lower than the previous.

3.2 Form

The movement begins with the subject, which repeats without any transformation in m. 9. An entrance of the same subject in retrograde accompanies this repetition, thus creating a *canon cancrizans*, or crab canon. Nevertheless, this compositional technique creates a binary form; the A section consists of the canon's subject and the B section consists of the subject performed against its retrograde. In regard to this movement, Roman Vlad states, "this *Canone retrogrado* reconciles abstract formal strictness with a power of communication and feeling that justifies the 'amoroso' of the description."[4]

Section 3.3 provides an analysis of the A section, mm. 1-8. The B section begins in m. 9 with a gradual change in tempo. Further discussed in Section 3.4, the B section is marked by the entrance of the accompanying subject in retrograde. Example 3.2 shows the form and row realizations of "Andantino Amoroso."

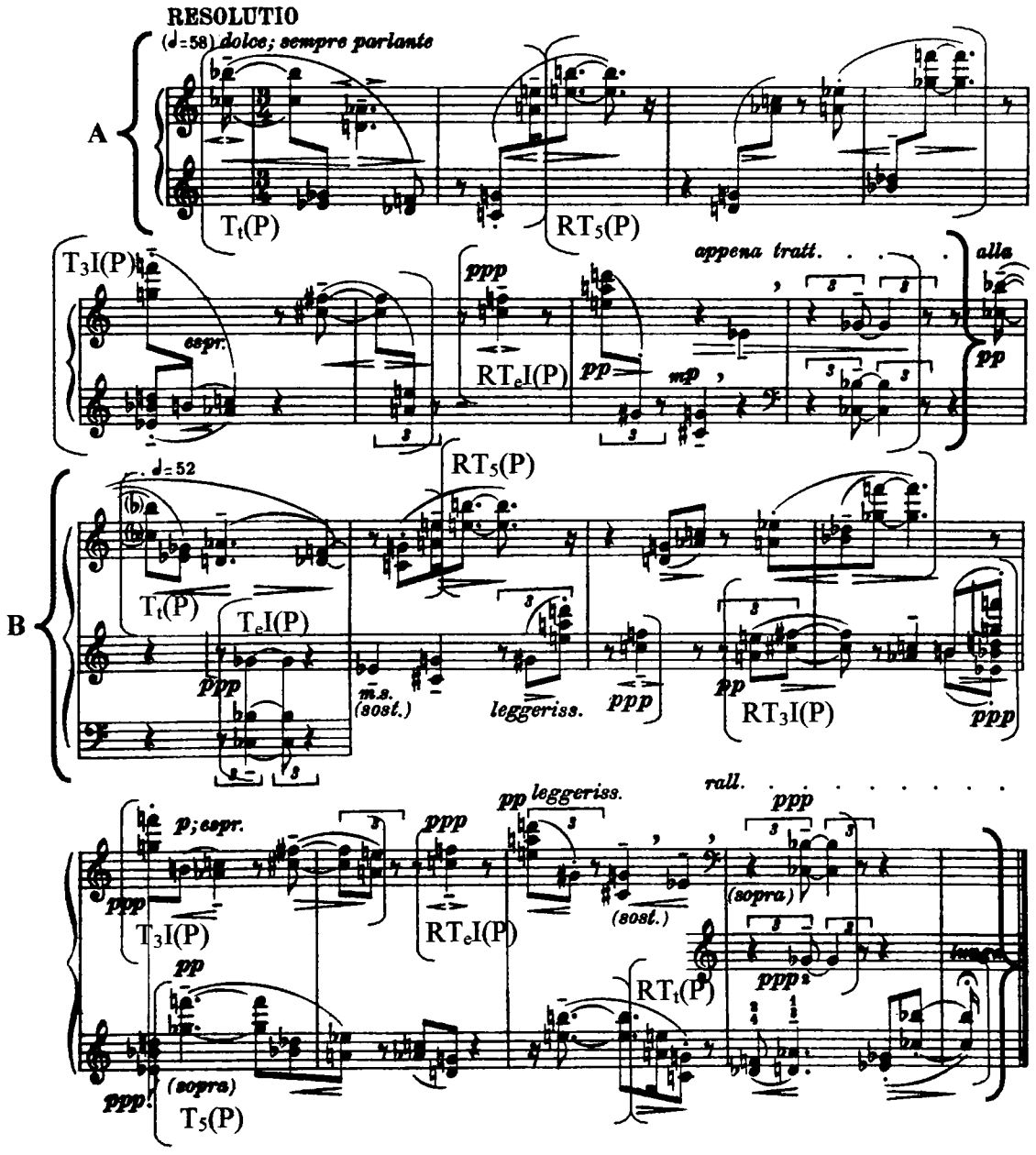
[4] Vlad (1957: 48).

Example 3.2

Form of "Andantino Amoroso e Contrapunctus Tertius"

The braces indicate sections A and B and the brackets indicate the row forms.

Section A – Measures 1-8
Section B – Measures 9-end



3.3 Measures 1-8

Section 3.3 provides a twelve-tone analysis of the A section of "Andantino Amoroso." The row forms of Section A can be found in the first eight measures of Example 3.2.

The movement begins with fluid lyrical lines composed of chords of unequal length. Though composed entirely in 3/4 time, the movement never takes on a triple feel due to the placement of the chords and their unequal lengths. The music is marked *dolce; sempre parlante*. After hearing the movement, the listener may well be reminded of someone speaking aloud or telling a story. This is possibly due to the lack of a set metrical pattern.

Section 3.3 is divided into two sections. Section 3.3.1 provides an analysis of the row forms of mm. 1-8 and Section 3.3.2 discusses the tonal references.

3.3.1 Row Forms in Measures 1-8

The row of the movement is realized in the first two measures with a return of $T_t(P) = \langle t\text{-}e\text{-}3\text{-}6\text{-}8\text{-}2\text{-}1\text{-}5\text{-}7\text{-}0\text{-}9\text{-}4 \rangle$, first heard in the beginning of no.1, "Simbolo." This may not be aurally discernible because the row form in "Andantino Amoroso" uses different pitches. This row form can be seen in mm. 1-2 of Example 3.2.

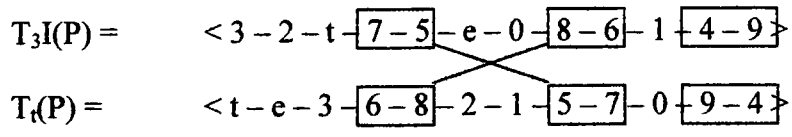
Unlike earlier movements of the *Quaderno Musicale di Annalibera*, many of the row forms of this movement are realized in both the right and left hands. Both hands realize the row at the beginning of the movement at the same time and later, separate hands realize the two different rows. The second canonic entrance appears in the middle

of the second full measure, as seen in Example 3.2. This is an $RT_5(P)$ = <e-4-7-2-0-8-9-3-1-t-6-5> realization. Half of the tones of the second entrance are composed with the same pitches so the listener can aurally discern the canonic feel, even in a retrograded transformation. The remaining six pcs, {1, 3, 5, 6, t, e}, are composed within an octave of the original row transformation.

Measure 5 marks the third row realization, $T_3I(P)$ = <3-2-t-7-5-e-0-8-6-1-4-9>, which can be seen in mm. 5-6 of Example 3.2. This row form shares invariant pcs with both the first and second row realizations, giving the $T_3I(P)$ realization aural similarities with $T_t(P)$ and $RT_5(P)$. Though these invariant pairs do not occur as pitches held together at the same time, theoretically, the two row forms might well sound similar. In connection with the second realization of the row, pc 0 and pc 8 remain together in both transformations. Between $T_t(P)$ and $T_3I(P)$, there are three invariants. Pcs 4 and 9 stay together, as do pcs 5 and 7, and pcs 6 and 8. There is likewise an invariant relationship between the second row, $RT_5(P)$ and the third row $T_3I(P)$. This is between the pcs 0 and 8. The invariant relationships among the three row forms are seen in Example 3.3.

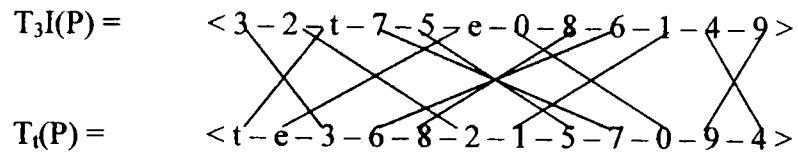
Example 3.3

Invariant Relationship Between $T_t(P)$ and $T_3I(P)$
(first and third entrances of the movement)



Example 3.3 (continued)

Voice Exchanges Between $T_t(P)$ and $T_3I(P)$



Invariant Relationship Between $RT_5(P)$ and $T_3I(P)$
(second and third entrances of the movement)

$T_3I(P) =$ <3 – 2 – t – 7 – 5 – e – 0 – 8 – 6 – 1 – 4 – 9>

$RT_5(P) =$ <e – 4 – 7 – 2 – 0 – 8 – 9 – 3 – 1 – t – 6 – 5>

The fourth entrance begins in m. 6 with row form, $RT_eI(P)$ = <5-0-9-2-4-8-7-1-3-6-t-e>. This realization can be seen in the aforementioned Example 3.2. As seen in Example 3.4, the $RT_eI(P)$ realization has three invariant pairs with $T_t(P)$. The pairs which remain together are {0, 9}, {3, 6}, and {t, e}. $RT_eI(P)$ also shares invariant pc pairs 1 and 3, and 6 and t with $RT_5I(P)$. There are no invariants between $RT_eI(P)$ and $T_3I(P)$. These invariant pairs provide aural similarities among the canonic entrances.

Example 3.4

Invariant Relationship Between $T_t(P)$ and $RT_eI(P)$
(first and fourth entrances of movement)

$RT_eI(P) =$ <5 0 – 9 2 – 4 – 8 – 7 – 1 – 3 – 6 t – e>

$T_t(P) =$ <t – e 3 – 6 – 8 – 2 – 1 – 5 – 7 0 – 9 4>

Invariant Relationship Between $RT_5(P)$ and $RT_eI(P)$
(second and fourth entrances of movement)

$RT_eI(P) =$ <5 – 0 – 9 – 2 – 4 – 8 – 7 1 – 3 6 – t e>

$RT_5(P) =$ <e – 4 – 7 – 2 – 0 – 8 – 9 3 – 1 t – 6 5>

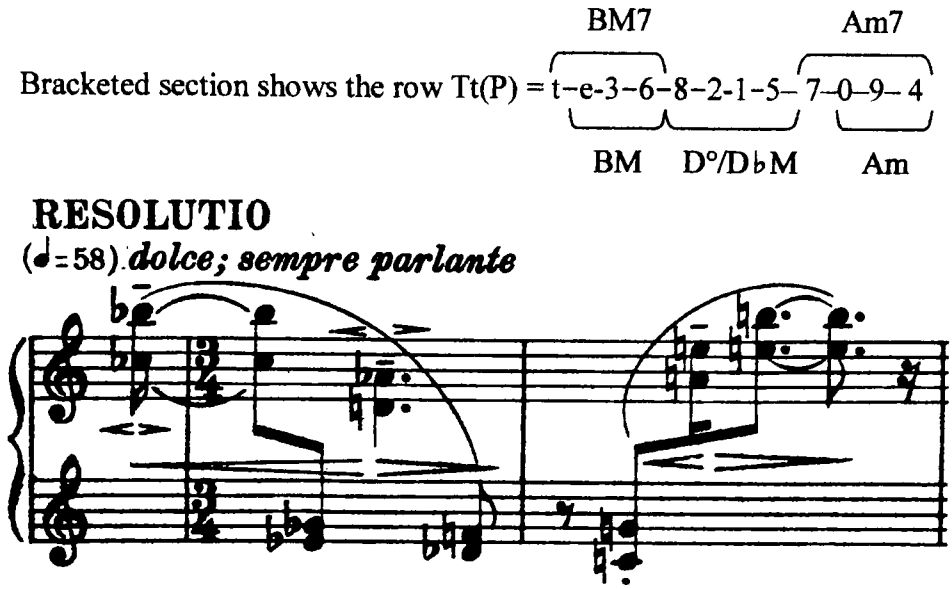
3.3.2 Tonal References in Measures 1-8

The *Quaderno Musicale di Annalibera* exhibits tonal references in several ways, and the "Andantino Amoroso" movement is no different. When listening to the movement for the first time, the listener may well hear very consonant harmonies. These harmonies are intervals of perfect fifths, major and minor thirds, and perfect fourths.

To begin, the row of "Andantino Amoroso" exhibits tonal references in its ordering. The order, predetermined by earlier movements, is seen in the first two measures of this movement. As illustrated in Example 3.5, the first four pcs can be heard as a BM^7 chord, while the second, third, and fourth pcs of the row can be heard as a B major triad. The row also outlines an A minor triad with its last three pcs and an Am^7 chord with its last four pcs.

Example 3.5

Measures 1 – 2 of "Andantino Amoroso e Contrapunctus Tertius"

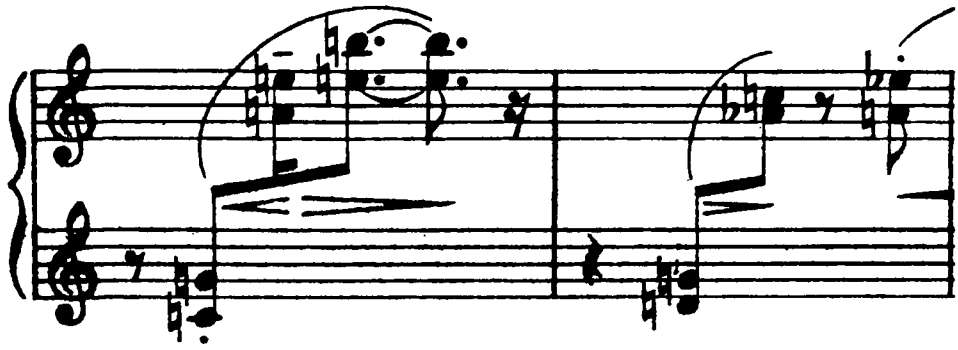


Tonal references can also be seen by way of triads and seventh chords voiced in close position. While the "Andantino Amoroso" movement does not exhibit many complete chords, there are many harmonic intervals of major and minor thirds as well as perfect fourths and fifths. For example, in the second measure of "Andantino Amoroso," the harmonic interval of a perfect fifth occurs three times in a row. In the following measure, the fifth is then inverted to a perfect fourth interval, which is followed by a major third interval and a diminished fifth. These tonal references can be seen in Example 3.6.

Example 3.6

Measures 2-3 of "Andantino Amoroso e Contrapunctus Tertius"

Note the Perfect Fifth Intervals in Measure 2.

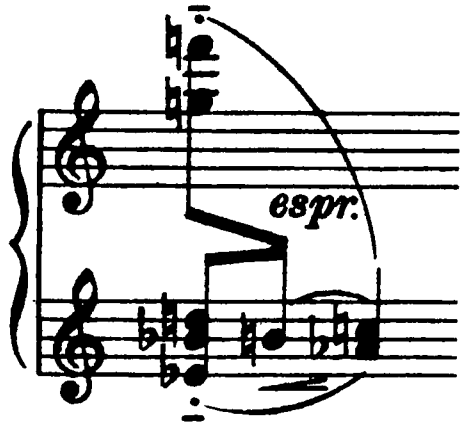


Intervals: P5 P5 P5 P4 M3 °5

The *Quaderno Musicale di Annalibera* also exhibits tonal references through local tonic-dominant relationships, which are prevalent throughout the "Andantino Amoroso" movement. These local tonal progressions can be seen in Example 3.7. Measure 5 begins with an E♭M^7 (or E♭M^9 including the F6) on beat one, the chord is stacked in thirds, save for the G5, leaving the listener with no doubt of its tertian quality. This aforementioned E♭M^7 (or E♭M^9) figure in m. 5 then moves to the "tonic" A♭ triad with a missing fifth on the following downbeat. Only the D♮ prevents one from calling the E♭ chord "dominant." Though there is a B♮4 between the two chords, this "sol-do" or "fifth" motion is easy to hear because the chords appear in the same register and in relatively close position.

Example 3.7

Measure 5 of "Andantino Amoroso e Contrapunctus Tertius"



E♭^{M7*} (B♮) A♭

A♭ Major: V^{M7} I

*This E♭^{M7} chord can also be heard as E♭M^{9}.

3.4 Measures 9-end

Section 3.4 provides an analysis of the B section of "Andantino Amoroso." The row forms of Section B can be seen in the aforementioned Example 3.2. Section 3.4 is likewise divided into two sections. Section 3.4.1 discusses the row forms found in mm. 9-17 and Section 3.4.2 provides an analysis of the tonal references.

3.4.1 Row Forms in Measures 9-end

The pickup dyad to m. 9 marks the fifth canonic entrance and also the beginning of the B section. This division of the movement is clearly audible because the original

canonic entrance returns in its exact form as seen earlier in m. 1. Returning with identical pitches and rhythm, this $T_t(P)$ row form is joined by a left-hand accompaniment.

The fifth entrance, though identical to the first even in p-space, is played by the right-hand only, rather than by both hands together. This is also true of the remaining three right-hand entrances. $RT_5(P)$, $T_3I(P)$, and $RT_eI(P)$ all return before the end, identical to the first half, even in p-space. The only exception to this is in the first chord of $T_3I(P)$ transformation, where pcs 2, 3, and t occur in the left-hand. The last chord of the transformation $RT_eI(P)$ is notated on an additional staff but the entire chord is still played by the right hand. The right-hand row realizations of Section B can be seen in the aforementioned Example 3.2.

The accompanying rows that appear in the second half of the movement are the first four rows: $T_t(P)$, $RT_5(P)$, $T_3I(P)$ and $RT_eI(P)$, transformed by retrograde and ordered in retrograde. Therefore, the final four rows of the movement, beginning in m. 9, are $T_eI(P)$, $RT_3I(P)$, $T_5(P)$, and $RT_t(P)$, respectively.

The first accompanying transformation, $T_eI(P)$ = <e-t-6-3-1-7-8-4-2-9-0-5>, is located on the second and third staves of m. 9. This marks the fourth of the canonic entrances in retrograde.

The second accompanying transformation occurs in m. 11 as $RT_3I(P)$ = <9-4-1-6-8-0-e-5-7-t-2-3>. This row form, which is the retrograde of the previous $T_3I(P)$ row form, is played against an $RT_5(P)$ row form in the top staff.

Measure 13 marks the third accompaniment entrance as $T_5(P)$ = <5-6-t-1-3-9-8-0-2-7-4-e>. This entrance presents the $RT_5(P)$ row form first seen in the second half of m. 2 in retrograde.

The final accompanying transformation, which serves as the last row of the movement, is $RT_t(P)$ = <4-9-0-7-5-1-2-8-6-3-e-t>. This is aurally perceivable because it is a retrograde transformation of the original row, Tt(P) = <t-e-3-6-8-2-1-5-7-0-9-4>, appearing as the same pitches and rhythm. This $RT_t(P)$ row form, which begins in the second half of m. 15, accompanies the final $RT_eI(P)$ row form in the uppermost staff. These final four accompanying row transformations can be seen in the left-hand part of Section B in the aforementioned Example 3.2.

While a twelve-tone row is always combinatorial with its own retrograde, one interesting observation in regard to "Andantino Amoroso" is that this relationship is seen between the first and final row forms of the movement due to its crab canon construction. Because the final transformation of the movement is a retrograde of the first row without transposition, the hexachords <t-e-3-6-8-2> and <1-5-7-0-9-4> can combine with their complements to complete the aggregate. This is seen in Example 3.8.

Example 3.8

Retrograde-Combinatorial Relationships Between Tt(P) and RTt(P)

$T_t(P)$ = <t – e – 3 – 6 – 8 – 2 + 1 – 5 – 7 – 0 – 9 – 4>

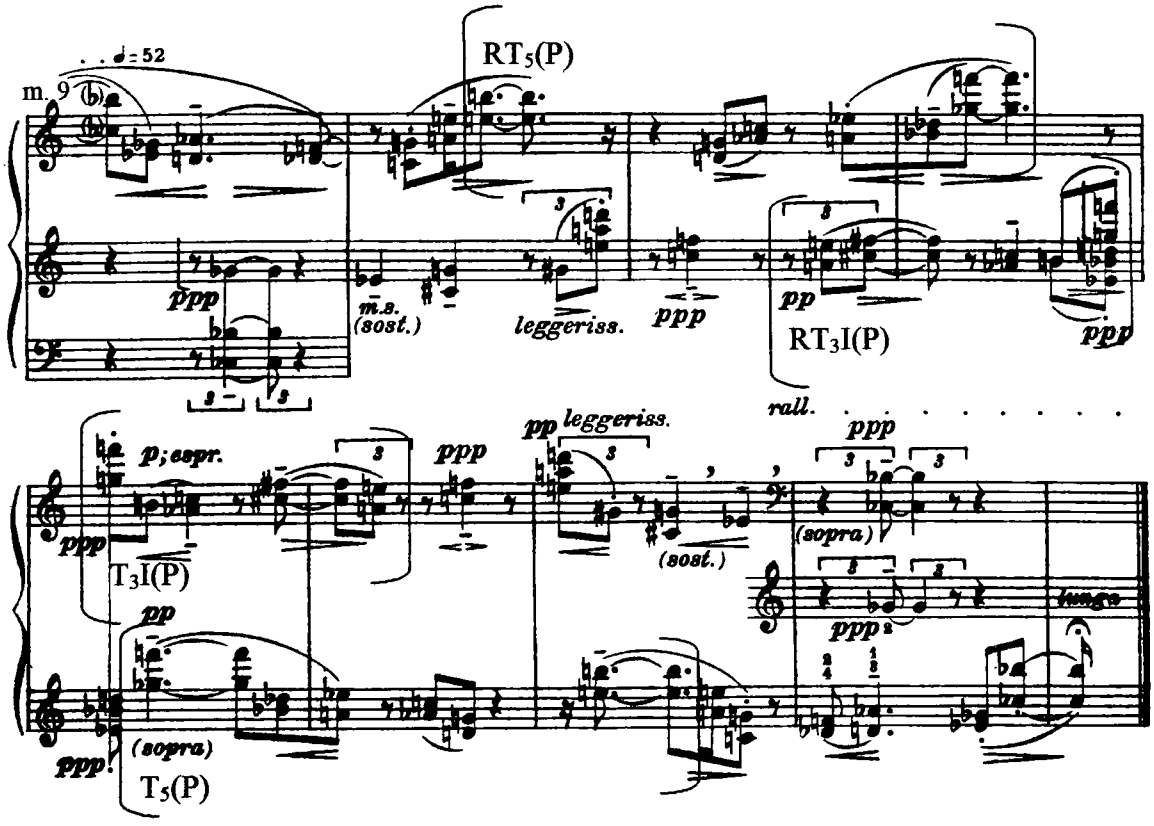
$RT_t(P)$ = <4 – 9 – 0 – 7 – 5 – 1 + 2 – 8 – 6 – 3 – e – t>

This is likewise true of the second and third row forms of the canonic entrance beginning in the uppermost staff of m. 9. This can be seen in Example 3.9. The row form $RT_5(P)$ begins in m. 10 and is followed by the row form $T_3I(P)$. These rows are accompanied by the row forms $RT_3I(P)$ and $T_5(P)$, which are the second and third row forms of the third canonic entrance. Because the $RT_5(P)$ row form is played against $RT_3I(P)$ in mm. 10-12 and the $T_3I(P)$ row form is played against $T_5(P)$ in mm. 13-15, the retrograde-combinatorial relationship is aurally present.

Example 3.9

Retrograde-Combinatorial Relationships

Between Row Forms $RT_5(P)$ and $T_5(P)$ and Row Forms $T_3I(P)$ and $RT_3I(P)$



Example 3.9 (continued)

$RT_5(P)$ = <e – 4 – 7 – 2 – 0 – 8 – 9 – 3 – 1 – t – 6 – 5>

$T_5(P)$ = <5 – 6 – t – 1 – 3 – 9 – 8 – 0 – 2 – 7 – 4 – e>

$T_3I(P)$ = <3 – 4 – 8 – e – 1 – 7 – 6 – t – 0 – 5 – 2 – 9>

$RT_3I(P)$ = <9 – 2 – 5 – 0 – t – 6 – 7 – 1 – e – 8 – 4 – 3>

There are also several examples of invariance between the second and third canonic entrances. The aforementioned $T_eI(P)$ transformation, occurring in m. 9, is aurally similar to its accompanying row form, $T_t(P)$, due to the invariant pcs {e,t}, {3,6}, and {0,9}. This is again seen in the final entrances of the movement between the row forms $RT_eI(P)$ and $RT_t(P)$. The row forms $RT_3I(P)$ and $RT_5(P)$ as well as their retrograded counterparts, $T_5(P)$ and $T_3I(P)$ share the invariant pcs {6,t}. The use of the same pcs causes these invariant pairs to be more perceptible to the ear. These invariant relationships are seen in Example 3.10.

Example 3.10

Invariant Relationship Between Second and Third Canonic Entrances

$T_eI(P)$ = <e – t 6 – 3 1 – 7 – 8 – 4 – 2 9 – 0 5>

$T_t(P)$ = <t – e 3 – 6 8 – 2 – 1 – 5 – 7 0 – 9 4>

Example 3.10 (continued)

$RT_3I(P) = \quad <9-2-5-0-t-6-7-1-e-8-4-3>$

$RT_5(P) = \quad <e-4-7-2-0-8-9-3-1-t-6-5>$

$T_5(P) = \quad <5-6-t-1-3-9-8-0-2-7-4-e>$

$T_3I(P) = \quad <3-4-8-e-1-7-6-t-0-5-2-9>$

$T_t(P) = \quad <t-e\ 3-6-8-2-1-5-7\ 0-9-4>$

$T_eI(P) = \quad <e-t\ 6-3-1-7-8-4-2\ 9-0-5>$

Though the layout of "Andantino Amoroso" has the potential to act as a never-ending movement, Dallapiccola chooses to end it after three complete expositions of the subject. The first entrance appears in m. 1 while the third entrance appears in retrograde against the second entrance in m. 9.

3.4.2 Tonal References in Measures 9-end

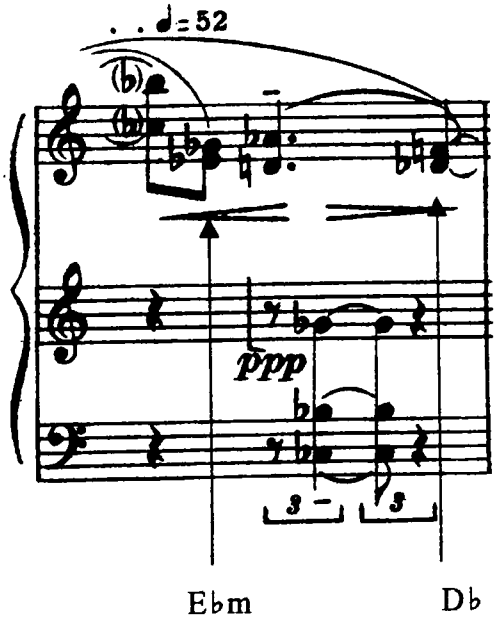
Many of the tonal references exhibited in the first half of "Andantino Amoroso" are again present due to the form of the movement. As previously mentioned, tonal references are exhibited in three ways: through row order, through triads and seventh chords voiced in close position, and through local tonic-dominant relationships.

The order of the row was discussed in Section 3.3b. An example of tonal references exhibited by way of triads and seventh chords voiced in close position occurs

in m. 9 of "Andantino Amoroso." This can be seen in Example 3.11. The second eighth note chord of m. 9 exhibits an E♭ minor triad in root position. Though the chord appears on paper as an {E♭4, G♭4} dyad, the B♭5 of the previous dyad is aurally perceivable and carries over to give the following chord the sound of an E♭ minor triad. This same idea is seen in the final eighth note chord of the measure. The {D♭4, F4} dyad may well be perceived as a D♭ major triad in root position because the fifth of the chord is carried over from the previous dyad. This is easy to hear due to the fact that the chord is stacked in thirds and played in close position.

Example 3.11

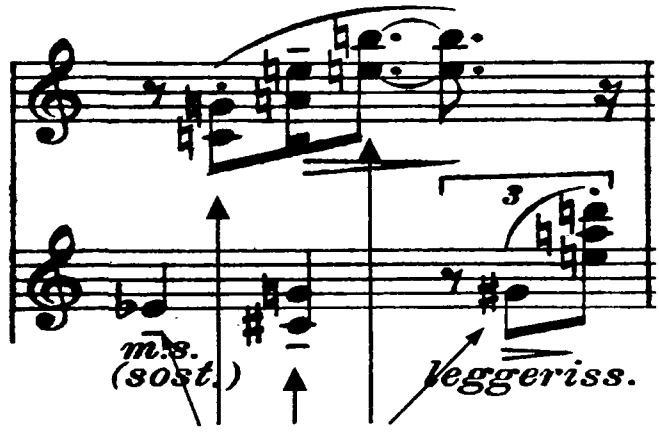
Measure 9 of "Andantino Amoroso e Contrapunctus Tertius"



The following measure likewise exhibits triads and seventh chords played in close position. Example 3.12 shows three examples of triads and seventh chords found in m. 10. The measure begins with a C minor triad stacked in thirds and played in close position. This triad is followed by an $A^{6/5}$ chord, which is then followed by an $E^{6/3}$ major triad. The aforementioned $E^{6/3}$ major triad originally appears without the third of the chord in the right-hand line, but is later joined by G#4 in the left hand. All of these chords are quite easy to hear, for they all occur in close position. Many of these tonal references are likewise exhibited in local harmonic progressions as well.

Example 3.12

Measure 10 of "Andantino Amoroso e Contrapunctus Tertius"



Cm – $A^{6/5}$ – $E^{6/3}$

3.5 Conclusion

The *Quaderno Musicale di Annalibera*, though a twelve-tone composition, contains many tonal references. While a listener is able to discern a row or its

transformations after several hearings, one must put forth effort to really detect these rows. The beauty, serenity, calmness, and placidity disguise the compositional technique. "Andantino Amoroso" imparts just these qualities. These qualities unfold through canons, lyrical melodies, and expressive writing. The row, which serves as a basis of all eleven movements, allows for fleeting moments of tonality. Through his use of tonal references, Dallapiccola is able to manipulate the row to provide the listener with a sound that, at times, seems both tonal and atonal.

CHAPTER IV

CONCLUSION

While theorists and musicologists agree that Luigi Dallapiccola was influenced by members of the Second Viennese School, these same scholars are aware that his music does not in fact belong to any one particular style of composition. Dallapiccola may well have been influenced by the music of Schoenberg and the Viennese school, but at the same time, his compositions contrast with other twelve-tone works. Because he does not fit into any one specific category, the music of Dallapiccola has often been left untouched. It is rarely played, especially in Italy, and it has yet to be thoroughly researched. According to Brian Alegant,

> "Theorists agree that Luigi Dallapiccola is one of the most accomplished 12-tone composers. His output comprises a variety of frequently performed and highly respected works, including ballets, choral music, concerti, film scores, piano music, song cycles, operas, and chamber pieces. In addition, he enjoyed international fame as a lecturer, teacher, author, and member of the national academies of arts in the U.S., France, and England. And yet, little has been written about Dallapiccola's music in general, and virtually nothing has been said about his use of harmony. The literature consists of a handful of studies that focus primarily on his rhythmic or melodic organization and one close reading of one movement from an early work."[1]

This thesis has argued that Dallapiccola's only twelve-tone composition for piano, *Quaderno Musicale di Annalibera*, can be analyzed using both serial and tonal approaches. These analyses are shown in the study of two movements from the *Quaderno*, no. 1, "Simbolo" and no. 7, "Andantino Amoroso e Contrapunctus Tertius."

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[1] Grashoff (1999).

The *Quaderno Musicale di Annalibera*, though twelve-tone in composition, exhibits many tonal references. These references are illustrated in this thesis in three ways. First, Dallapiccola presents triads and seventh chords within the ordering of row. Second, chordal transformations are presented in close position to encourage the listener to perceive them as triads or seventh chords in the realization of the row. Third, tonal references are also present in the local tonic-dominant relationships, which are prevalent throughout movements nos. 1 and 7 as well as the entire composition.

While a listener may generally be able to discern a row or its transformations after several hearings, one must put forth effort to really detect these rows. Dallapiccola's compositional technique adds beauty, serenity, and placidity to his work and the *Quaderno Musicale di Annalibera* imparts just this. These qualities unfold in the present composition through canons, lyrical melodies, and expressive writing.

Theorists and musicologists examine the music of Dallapiccola, as well as other members of the Second Viennese School, to study the compositional framework of rows and transformations. Understanding this framework of a composition can lead to a greater appreciation for the musician and non-musician alike. The twelve-tone row, which serves as a basis of all eleven movements of the composition, allows for fleeting moments of tonality. Through his effective use of tonal references, Dallapiccola is able to manipulate the row to provide the listener with a sound that, at times, seems alternately tonal and atonal.

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