HARMONY, FORM, AND VOICE LEADING
IN THE MATURE WORKS OF ANTONÍN DVOŘÁK

by

DANIEL J. PARTRIDGE

A dissertation submitted to the Graduate Faculty in Music in partial fulfillment of the requirements for the degree of Doctor of Philosophy, The City University of New York

2012

This manuscript has been read and accepted for the
Graduate Faculty in Music in satisfaction of the
dissertation requirement for the degree of Doctor of Philosophy.

Joseph N. Straus

Date — Chair of the Examination Committee

David Olan

Date — Executive officer

L. Poundie Burstein

Norman Carey

William Rothstein

Joseph N. Straus

Supervisory Committee

THE CITY UNIVERSITY OF NEW YORK

Abstract

HARMONY, FORM, AND VOICE LEADING
IN THE MATURE WORKS OF ANTONÍN DVOŘÁK

by

DANIEL J. PARTRIDGE

Advisor: Professor William Rothstein

This dissertation attempts to locate the music of Antonín Dvořák in the broader historical context of the late nineteenth century and to trace the way in which his music participated in the development of a late nineteenth century musical style. The dissertation is in three parts, following the three domains of the title: harmony, form, and voice leading. The first part is divided into two chapters, the first of which examines the evolution of Dvořák's harmonic practice through his early New German experimentation, his later engagement with the music of Smetana, and his sympathy toward harmonic aspects of the music of Schubert and Brahms. The second chapter details the way that Dvořák contributed to later nineteenth-century stylistic practice. This is accomplished through the exploration of three primary models: 1) *enriched chromatic function* (including juxtaposed third-related harmonies, voice leading between different types of seventh chords, and the concept of *Mehrdeutigkeit*); 2) *enriched diatonic function* (modal practices, pentatonicism, and non-standard diatonic sonorities through voice

leading), and 3) *enriched cadential function* (which can be either chromatic or diatonic, with a special emphasis on leading-tone substitutions by the submediant and subtonic scale degrees).

The second part of the dissertation, concerned with form, is also subdivided into two chapters. The first of these (chapter 3) discusses Dvořák's expansion of sonata form beyond its Classical boundaries. Couched in the nomenclature of Hepokoski and Darcy's Sonata Theory, this chapter is concerned largely with Dvořák's construction of the second group of a sonata (the S- and C-zones), including his treatment of the medial caesura and his approach to expositional (or sonata) closure. Very often, Dvořák's strategies are deformational according to eighteenth-century norms. Chapter 4 is a more detailed exploration of the relationship between Brahms and Dvořák (and their mutual Schubertian inheritance) than has been previously attempted, and draws on biographical and stylistic analysis for its conclusions.

The last part, composed of one chapter, is a study of Dvořák's voice-leading practices at middleground levels both within and over sectional boundaries, and concludes with an in-depth analysis of the String Quartet in C Major, op. 61 (1881).

ACKNOWLEDGEMENTS

I wish to thank, first and foremost, my wife, Katie, whose love and understanding has grounded me for the duration of this project; her continual support and kindness have been truly exceptional while I grappled with the long hours and constant frustrations that are often associated with efforts of this kind. I am also boundlessly grateful to my parents, Brian and Cheryl, for their unflagging support of my musical studies (including the provision of music lessons when I was younger) and, in later years, for their generous offer of occasional child care for Evelyn and Emily, my two adorable daughters, who were born while I wrote this dissertation.

Of course, emotional support alone does not a dissertation make. I would never have come close to finishing this study were it not for the efforts and guidance of my advisor, Prof. William Rothstein, and my reader, Prof. L. Poundie Burstein. They each possess a formidable intelligence and their encyclopedic knowledge of both the music itself and the academic literature that has grown up around this repertoire has been invaluable. Their commitment to the highest standards of musical scholarship, while often quite demanding, has compelled me to produce a document that I believe adds real value to the small but growing field of Dvořák studies. I also wish to thank my committee members, Professors Joseph Straus and Norman Carey, for their willingness to read about Dvořák's music and offer their guidance during the final stages of this entire process. As always in studies of this kind, any errors or omissions that remain in this work are my own.

Table of Contents

List of Illustrations

Introduction

On September 27, 1892, a balding, middle-aged man from Bohemia with a fierce beard stepped off the transatlantic liner, S. S. *Saale*, and into American music history. The man was Antonín Dvořák, the famous Czech composer who had been hired to direct the National Conservatory in New York City. The works he composed during his tenure in the United States—including the "New World" Symphony, the String Quartet in F Major, op. 96, "American," and the Cello Concerto in B Minor—have never left the repertoire, especially on this side of the Atlantic. They have also received more than their fair share of critical attention.[1]

The genesis of this study was my attempt to explore the masterworks that made Dvořák famous even before his time in America, those pieces that earned him the right to be invited in the first place. I have always been drawn to instrumental works like the Seventh Symphony, the Piano Quintet in A Major, op. 81, and the "Dumky" Trio; to me they sound ever fresh and vivacious against the backdrop of a nineteenth-century musical mainstream centered mostly on Austria and Germany. I wanted to make sure that they had their day in the analytical spotlight. So, I had initially thought to limit myself to those works written before his American sojourn but after he had found his mature "voice" (the timetable for which is outlined in chapter 1). I quickly found that many of the later works, especially the Ninth Symphony, had bearing on my

[1] The only volume in the Cambridge Music Handbook series for Dvořák is a book-length study of the Cello Concerto, Jan Smaczny's *Dvořák: Cello Concerto* (New York: Cambridge University Press, 1999). The Ninth Symphony has been covered many times over the years by such writers as John Clapham, "The Evolution of Dvořák's Symphony 'From the New World,'" *The Musical Quarterly* 44, no. 2 (Spring 1958), 167–183; Klaus Döge and Karin Stöckl, *Antonín Dvořák, Sinfonie Nr.9 e-moll, op.95 'Aus der Neuen Welt': Einführung und Analyse* (Mainz: Schott, 1982); and James Hepokoski, "Culture Clash: James Hepokoski Revisits Dvořák's *New World Symphony*," *The Musical Times* 134, no. 1810 (Winter 1993), 685–688 ; more recently, Benedict Taylor has generalized Dvořák's American practices in "Modal Four-Note Pitch Collections in the Music of Dvořák's American Period," *Music Theory Spectrum* 32, no. 1 (Spring 2010), 44–59.

interest in Dvořák's treatment of sonata form. Likewise, I found myself drawn to harmonic details in his early works, especially those that seem heavily indebted to Wagner.

So to clarify: although the title of this study is "Harmony, Form, and Voice Leading in the Mature Works of Antonín Dvořák," the bulk of the mature works that I studied in depth were instrumental works written between about 1876 and 1892. Thus, I spend little time on the works of Dvořák's late maturity despite their great worth. The last two string quartets do get some attention with regard to form, but there is almost no mention of the late tone poems or the Cello Concerto. Other than the occasional mention of certain parts of the Requiem and some passages from *Rusalka*, Dvořák's sizable vocal and operatic output is also notably absent from my discussion. One reason is that a combined study of Dvořák's instrumental and vocal music would become unwieldy. The more important reason, however, is that a great deal of Dvořák's operatic and vocal music is in Czech (the Requiem and the *Stabat Mater* being notable exceptions). I feel that only a fluent Czech speaker would be able to fully explore the relationship of text to music. Unfortunately, I speak and comprehend Czech at only the most rudimentary level.

It is my hope, however, that the observations that I make about the instrumental music of Dvořák's maturity, and the conclusions that I draw from those observations, will be at least partially, if not wholly, informative to future analyses of those works in his oeuvre not represented herein.

Part I. Harmony

Dis-moi ce que tu manges, je te dirai ce que tu es

(Tell me what you eat and I will tell you who you are)

—Jean Anthelme Brillat-Savarin

INTRODUCTION

As the great gastronomical writer Brillat-Savarin claimed in *The Physiology of Taste* (1825), it is possible to make a reasonable assumption about someone based on what they consume.[1] So too, in music, can we begin to understand a composer's work if we examine his or her "consumption," that is, the influences that help form a part of a given composer's style. Antonín Dvořák, compositionally active from the early 1860s onward, was heir both to the patrimony of Classic diatonic harmony and to the more newly explored modal and chromatic realms of Romantic harmony. While it is obvious that Haydn, Mozart, and Beethoven are the principal models of Classic tonality for any nineteenth-century composer, it is difficult, even at the remove of over a century, to pinpoint a similar paradigmatic nexus of composers for Romantic tonality.

Thus, though Dvořák inherited two connected domains of tonal practice, Classic and Romantic, his status as a member in the latter poses the following questions:

[1] Jean Anthelme Brillat-Savarin, *The Physiology of Taste: Or, Meditations on Transcendental Gastronomy*, trans. by M.F.K. Fisher (New York: Penguin Classics, 1994).

1) By which Romantic composers was Dvořák most strongly influenced, i.e., whose music did he "consume"?
2) To what extent is this influence apparent in Dvořák's music?
3) How do such influences manifest themselves?
4) What harmonic elements of Dvořák's music are original and/or distinctive and how do they fit in to the harmonic practice of the later 1800s?

The first three questions are of a kind and will largely be dealt with in chapter 1, subtitled "Romantic influences." The fourth question requires a broader inquiry into nineteenth-century harmonic developments and will be dealt with below in chapter 2, subtitled "Trends in nineteenth-century harmony."

Inasmuch as it is possible to separate the integrated compositional parameters of harmony and form, the first two chapters explore local harmonic phenomena in Dvořák's music. For the most part, I will reserve discussion of form-spanning harmonic events, such as key areas and middleground tonal relationships, for the chapter on form. In some cases, however, it will still be necessary to explore large-scale formal relationships in this chapter in order to correctly understand the local harmonic relationships.

CHAPTER 1. ROMANTIC INFLUENCES.

The question of what constitutes influence among composers and how their music manifests these influences is complex. The issue of what, exactly, constitutes the uniqueness of style in the older composer's works and its subsequent transmittal to the younger must be addressed. There must also exist evidence—and we can charitably include that of the reasonably strong circumstantial variety—that a younger composer was actually aware of an older composer's work and not just the general stylistic milieu in which the older composer worked. Further, for composers who lived at the same time, later scholars must not overlook issues of cross-pollination (as in the case of Mozart and Haydn, or, as we might profitably discover, between Dvořák and Brahms). As Göran Hermerén has pointed out in his work on influence in literature and the arts, influence statements are often made in an uncritical fashion, treated as facts in themselves and not as hypotheses in need of evidential support.[2] Thus, in discussing the various romantic influences that may have inspired Dvořák's creative processes, I will draw upon relevant biographical information as well as make detailed stylistic comparisons between his works and those of his predecessors.

Influence manifests itself in several ways, some obvious and others less so. The more obvious ways include quotation from earlier works and/or imitation of an earlier style using characteristic chord progressions, harmonic rhythm, phrase structures, melodic schemata, and the like. Gerald Abraham discusses two types of imitation, the first being a composer's unconscious acquisition of an earlier composers' style, and the second being a composer's conscious

[2] Göran Hermerén, *Influence in Art and Literature* (Princeton: Princeton University Press, 1975).

modeling of his works on those of an older master.[3] With regard to the latter, J. Peter Burkholder, in his monumental study of borrowing and influence in the music of Charles Ives, discusses several techniques in which a composer might employ elements of earlier musical works. These include modeling, writing variations on an existing tune, paraphrasing existing tunes, setting existing tunes to new accompaniments, transcribing a work for a new medium, and also using techniques such as cantus firmus, medley, quodlibet, stylistic allusion, cumulative setting, collage and others.[4] Conscious borrowing can be difficult to prove in the absence of a "smoking gun," that is, a direct quotation from an earlier work or a letter in the composer's hand discussing aspects of influence or borrowing. In this case, we can at least revert to the claim of unconscious borrowing, which is largely provable by stylistic comparison, though even this method is not infallible. Here, too, the question of borrowing is narrower than the general idea of influence between two composers. Less obvious forms of influence include both musical criteria (appropriation of formal genera, instrumentation, dance types, key schemes, etc.) and non-musical or meta-musical criteria (choice of texts, aesthetic orientations such as *Zukunftsmusik* or neoclassicism, etc.).

In this study, I will be taking a rather more traditional approach to influence studies, meaning that I will be mostly interested in resemblances between or among works. This is in distinction to one of Harold Bloom's famous ideas that an anxiety of influence can present itself in such a way that a work becomes antithetical to the original source material.[5] I am also

---

[3] Gerald Abraham, "Dvořák's Musical Personality," in *Antonín Dvořák: his Achievement*, ed. by Viktor Fischl (London: Drummond, 1943; reprint, Westport, CT: Greenwood Press, 1970), 197–99.

[4] J. Peter Burkholder, *All Made of Tunes: Charles Ives and the uses of Musical Borrowing* (New Haven, CT: Yale University Press, 1995), esp. pp. 3–4; the discussion of Dvořák's influence on the young Ives is interesting in and of itself, pp. 89–95.

[5] *The Anxiety of Influence: A Theory of Poetry*, 2nd ed. (New York: Oxford University Press, 1997). See also Mark Evans Bonds, *After Beethoven* (Cambridge, MA: Harvard University Press, 1996), which is a study of several

avoiding the kinds of intertextual readings of the kind practiced by Michael Klein, among others.[6] My main purpose in preferring to focus on resemblance as an indicator of influence stems from my dissatisfaction with the kinds of uncritical statements that one occasionally reads about Dvořák regarding his musical debt to Brahms and/or Schubert. For example, some commentators assume, wrongly, that Dvořák was influenced by Brahms throughout his entire career. Others overlook the importance of Wagner for the young Dvořák. In this chapter, I will be largely concerned with when Dvořák absorbed certain musical influences, from whom they came, and in what way they are manifest in his own music.

With the benefit of hindsight, I suggest that Wagner, Smetana, Brahms, and Schubert are the Romantic composers whose music, and ideas about music, most influenced Dvořák. Of these, Dvořák first felt the influence of Wagner and Smetana. Dvořák himself said of Wagner that, "…I was perfectly crazy about him, and recollect following him as he walked along the streets to get a chance now and again of seeing the great little man's face."[7] For the chronology of influences on Dvořák by Schubert and Brahms, current scholarship is somewhat unclear. Dvořák did not leave us the same types of autobiographical reminiscences for them as he did for Wagner. Given certain stylistic characteristics, such as the young Dvořák's fondness for mediant relationships and a melodic fluidity between a major key and its relative minor, some critics have drawn comparisons to Schubert. In contrast, Jan Smaczny claims that "when Dvořák was laying the foundations of his musical style, it seems clear that Beethoven, Mendelssohn and Schumann were of vital importance, while Schubert's presence in these formative years is far less

---

composers' reactions in their own work to the music of Beethoven using Bloom's methodology as a jumping off point.

[6] Michael Klein, *Intertextuality in Western Art Music* (Bloomington, IN: Indiana University Press, 2005).

[7] See Michael Beckerman, *New Worlds of Dvořák* (New York: Norton, 2003), 212. Beckerman sees Wagner as the most formative influence on Dvořák, an influence that did not wane over time but was sublimated into what Beckerman calls Dvořák's "style of styles." Cf. especially chapter 15, "Between a Ring and a Hard Place: Dvořák's Homeric Wagner," 209–225.

conclusive," and stipulates that these comparisons to Schubert should only be operative for the music written around the late 1870s and after.[8] Jarmil Burghauser states that Brahms, often cited as the impetus behind Dvořák's turn toward classicism in the mid-1870s, is probably less important than Smetana's influence (and possibly Schubert's).[9]

The murky provenance of these mid-1870s classicizing influences aside, Wagner's music had the most immediate impact on the young Dvořák (circa mid- to late 1860s), redirecting a compositional trajectory that had been, to that point, modeled largely after Mozart, Beethoven, Mendelssohn, and Schumann. Indeed, as David Beveridge has shown, Dvořák's earliest known works are largely diatonic and harmonically conservative; he states that Dvořák's "op. 1 and op. 2 are essentially untouched by romanticism."[10] Dvořák first encountered Wagner's music in the orchestra pit of the Provisional Theater in the early 1860s, after which, he began borrowing liberally from Wagner's style and became interested in the music of Liszt. This lasted until around 1874, a point at which we hear in his music a stylistic break, a classicizing turn, and the lessening importance of New German elements. Thus, we may be fairly sure, if never fully certain, that Dvořák's harmonic experimentation of the mid-1860s was inspired mostly by Wagner. I will use similar argumentation from Dvořák's biography to help support my claims of influence by the other composers below.

---

[8] See Jan Smaczny "The Schubertian Inheritance among Czech Composers in the Mid-nineteenth Century," *Schubert durch die Brille: Internationales Franz Schubert Institut—Mitteilungen* 21 (Summer 1998), 65. He confirms that Schubert was important for Smetana and Fibich. Since Smetana's influence on Dvořák was strongest from 1874 through the early 1880s, we might speak of an indirect Schubertian influence (distilled and transmitted through Smetana to Dvořák) that overlapped with Dvořák's gradual discovery of Schubert's music in the mid- to late 1870s onward.

[9] See Jarmil Burghauser, "Smetana's Influence on Dvořák's Creative Evolution," *Bedřich Smetana, 1824-1884: report of the International Musicological Conference, Praha 24th-26th May 1994* (Prague: Muzeum Bedřicha Smetany, 1995), 43–53.

[10] David Beveridge, *Romantic Ideas in a Classical Frame: the Sonata Forms of Dvořák* (Ph.D. diss., University of California, Berkeley, 1980), 28. He also states here that the "entire first group in both the first and last movements of op. 1, for example, is limited to the chords i, iv, $ii^{\emptyset 7}$, and V, avoiding even the simplest secondary dominants."

Finally, I must explain why, given their salience in the young Dvořák's musical education, Mendelssohn and Schumann do not attain the same level of importance, in terms of influence, as the four other Romantic composers I have already named; certainly, the music of Mendelssohn and Schumann displayed tonal and formal strategies that differed from the Classical style. Shortly after Dvořák became aware of their music, however, his fascination with Wagnerian harmony began. Wagner expanded the harmonic palette beyond Classical-era tonality in a way that Schumann and Mendelssohn did not. By the time Dvořák retreated from the excesses of his absorption with the Wagnerian aesthetic, it was the music of Smetana and, shortly thereafter, Schubert and Brahms that held his attention; the possibility of greater influence from Mendelssohn and Schumann had passed. To the extent that Mendelssohn and Schumann were important to Dvořák later in his career, he admired their handling of the Classic forms along with certain aspects of Schumann's piano writing.[11]

Wagner.

The young Dvořák was familiar with the music of the so-called New German School, especially Liszt and Wagner (but also the now less-familiar Joachim Raff), so it might seem fairer to speak generally of New German elements in his early music rather than focusing solely on Wagner. Although we must be mindful that the music of Liszt and Raff was certainly a formative component in Dvořák's understanding of nineteenth-century developments in harmony

[11] In his 1894 article on Schubert, Dvořák calls attention to the dimensions of Schumann's First and Fourth symphonies. See Antonín Dvořák, in collaboration with Henry T. Finck, "Franz Schubert." *Century Illustrated Monthly Magazine* 48, no. 3 (1894), 341–46. This article is reprinted on pp. 296–305 of John Clapham, *Antonín Dvořák, Musician and Craftsman* (New York: St. Martin's Press, 1966). Since compositions for piano do not form a major portion of Dvořák's mature work, the influence of Schumann's piano writing is minimal, but can be found in pieces such as the Theme with Variations, op. 36 (1876) or the *Poetic Tone Pictures*, op. 85 (1889).

and form, there are reasons to focus more specifically on Dvořák's absorption of Wagner's style. The first among these is that of his experience playing under Wagner's baton.[12] Dvořák was a violist in the orchestra that Wagner conducted during his visits to Prague in 1863. Among the pieces played were the *Faust* overture, the overture to *Tannhäuser*, the prelude to *Lohengrin* and extracts from *Die Meistersinger von Nürnberg*, *Tristan und Isolde*, *Die Walküre* and *Siegfried*.[13] Thus, Dvořák's contact with Wagner and his music was personal and immediate.

Although only a few of Dvořák's compositions survive from the time of Wagner's visit (Dvořák actually destroyed many of the pieces written around this period, including everything written between 1863 and 1864), Wagner's influence is present in extant works from just slightly later in the decade. Burghauser locates Wagner's influence as beginning with the last movement of the Second Symphony, op. 4 (1865), and Clapham speaks of works such as the String Quartets in B♭ Major, B. 17; D Major, B. 18; and E Minor, B. 19; and the operas *Alfred*, B. 16 and the first version of *Král a uhlíř* ("King and Charcoal Burner"), B. 21, all from 1868/9–71, as being composed in a "Wagner fever."[14] The quartets in particular favor such techniques as *unendliche Melodie*, sequence, turn figures, many episodes of chromatic melody and/or harmony, and a tendency toward amorphous forms. For example, the B♭ quartet (1869–70) avoids sonata form altogether.

---

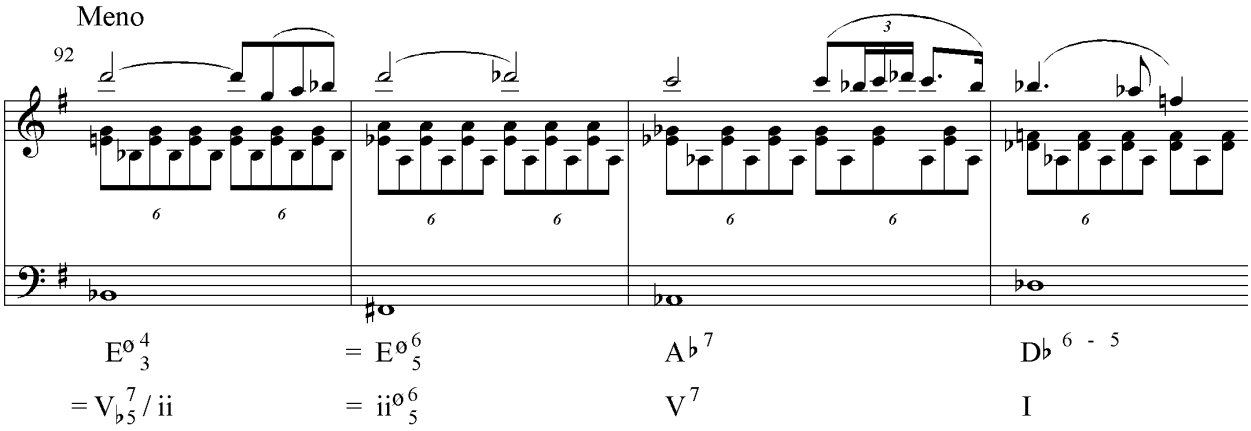
[12] Dvořák did not have a similar immediate personal contact with Raff or, more importantly, Liszt, although it was not for lack of trying: his 1873 scholarship application to study with Liszt in Weimar was unsuccessful; see Klaus Döge, *Antonín Dvořák. Leben-Werke-Dokumente* (Mainz: Schott, 1991), 137–38. Although I follow Clapham and Döge in believing that Dvořák really did meet Wagner, Jarmilla Gabrielová remains skeptical; see her "Antonín Dvořák and Richard Wagner," *Muzikologija* 6 (2006), 305–316.

[13] See Döge, 84–85. It is notable that through these performances Dvořák became familiar with some of Wagner's newest and most progressive compositions. That is, Dvořák played portions of *Tristan und Isolde* even before its 1865 premiere, and the performance of the overture to *Meistersinger* was probably the Prague premiere (since the overture had only been first performed several months earlier, in November 1862; indeed, Wagner had hardly begun Act I at the time of the Prague concerts).

[14] Burghauser, "Metamorphoses of Dvořák's Image in the Course of Time," in *Rethinking Dvořák*, ed. by David Beveridge (New York: Clarendon Press, 1996), 15; Clapham , 6.

The String Quartet in E Minor, B. 19 (1870), written in one long continuous movement, showcases many of the aforementioned attributes. Clapham points to the highly chromatic second subject of the first movement (written in a loose sonata form) as "perhaps the most striking example of Wagnerism" in this quartet; see Example 1–1 for an adaptation of Clapham's Example 5.[15] The use of a half-diminished seventh chord for the beginning of the theme seems patterned after Wagner, as does the appoggiatura in the second measure.

Example 1–1. String Quartet in E Minor, B. 19.Clapham's Ex. 5, with my harmonic analysis, which demonstrates an affinity with Wagnerian chromaticism.



The second portion of the work-long movement, later adapted to become the *Notturno* in B major, op. 40, presents another reproduction of Wagner's style: it has a long-breathed endless melody, it uses many pedal points, it exhibits much sequential repetition (often with turn figures), and has many upward resolving appoggiaturas whose harmonies are exploited as much for their sonorous quality as their contrapuntal tension.[16] It is instructive to trace affinities

[15] Clapham, 162.
[16] Dvořák evidently felt the movement had artistic merit: he revised it for inclusion in the String Quintet in G Major, op. 77 (1875, revised 1887—it was the originally the second movement, "Intermezzo," but was later removed from

between this movement and the opening of Wagner's *Siegfried Idyll* especially since Dvořák could not have known the *Idyll*, as it also dates to 1870. This is not a contradiction; while it is true that the *Idyll* incorporated some material from the opera *Siegfried*, portions of which Dvořák did play in concert, the affinity between the second section of the E-minor quartet (or *Notturno*) and the *Idyll* is not so much an actual literal borrowing of a specific musical passage by Dvořák as it is a very successful replication of the Wagnerian style with which Dvořák was already familiar. See Example 1–2 for the following brief comparison of the two pieces:[17]

1) both feature a quiet, *legato* string texture
2) both begin on a lengthy $\hat{5}$, quasi-pedal point
3) both initially feature a rhythmically regular, descending accompaniment, mostly in parallel sixths
4) a motivic cross-rhythm (marked *y* in the scores)
5) rising chromatic motives (marked *x* in the scores), although Dvořák's use is explicitly in the melody
6) both rely heavily on pedal point

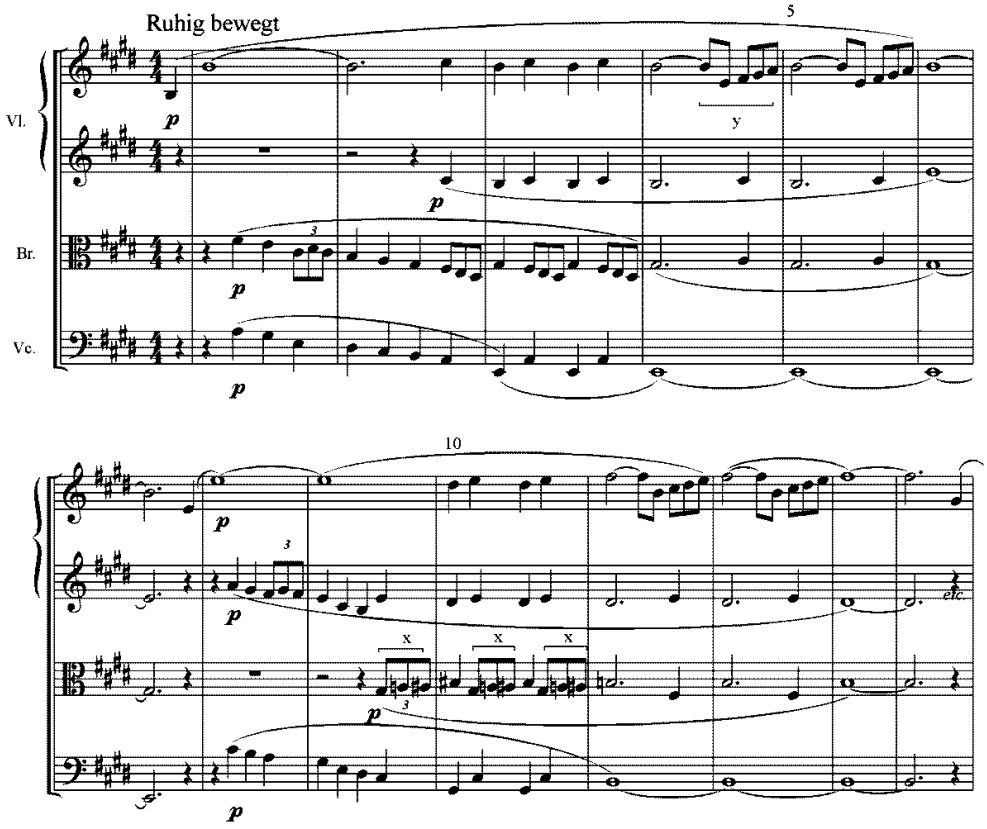
---

the final version of the piece), and then revised it again as the stand-alone *Nocturne*, op. 40 (1875), for string orchestra.

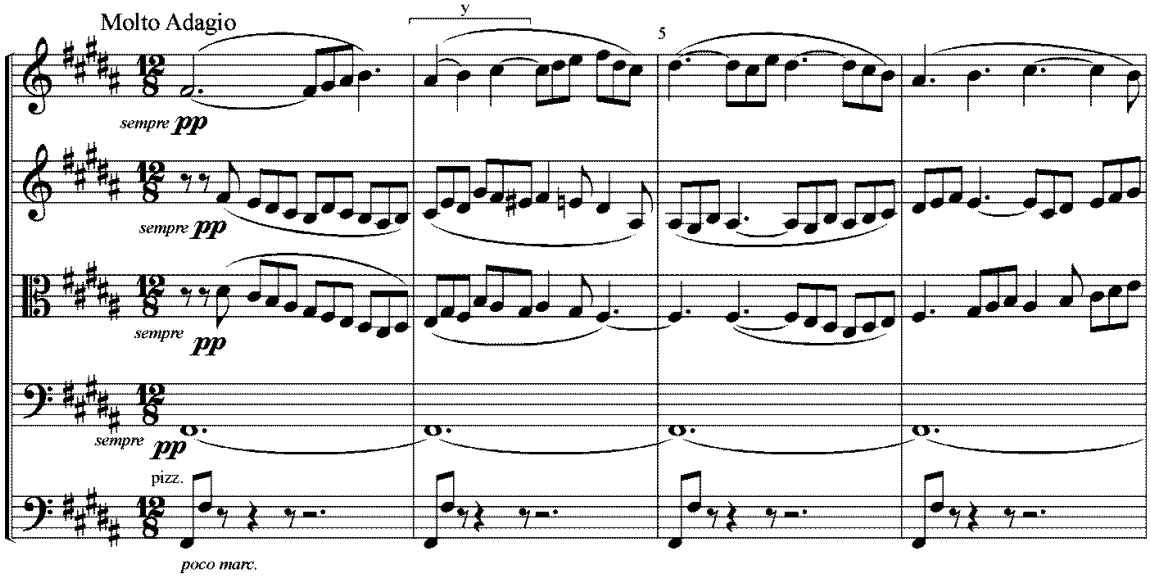
[17] In addition to noticing the connection with the *Siegfried Idyll*, David Hurwitz claims the piece has an affinity with Rachmaninov's later melodic practice, see his *Dvořák: Romantic Music's Most Versatile Genius* (Pompton Plains, NJ: Amadeus Press, 2005).

Example 1–2.

a. Wagner, *Siegfried Idyll*, mm. 1–14. Motivic cross-rhythms (*y*) and rising chromatic motive (*x*).

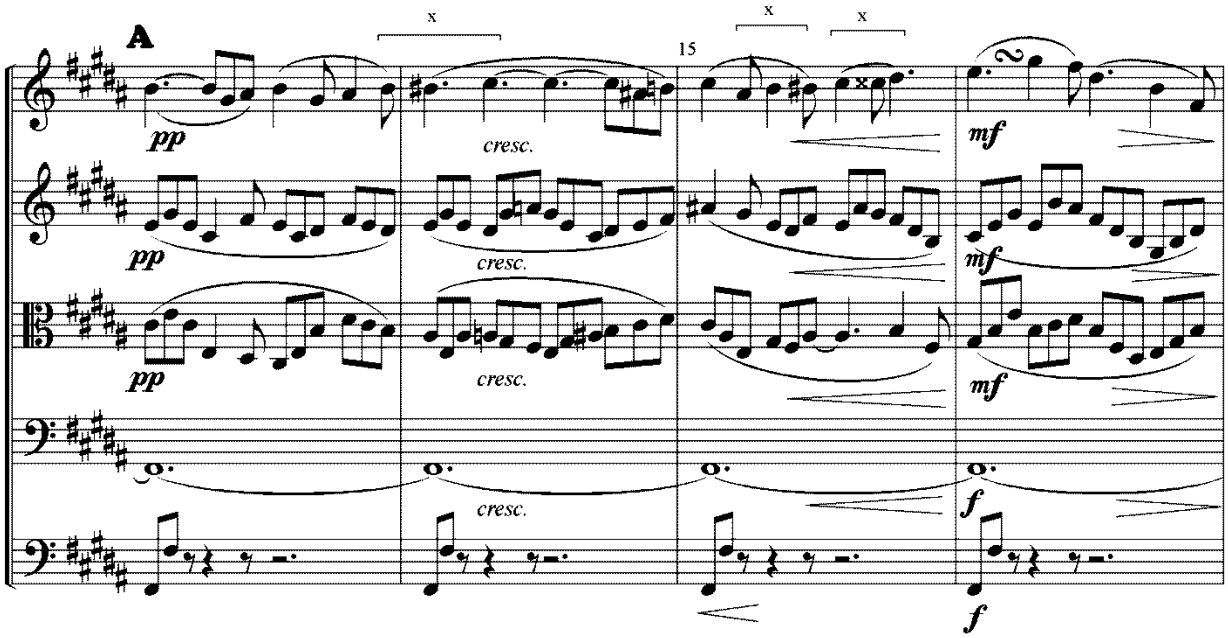


b. Dvořák, *Notturno*, op. 40, mm. 3–7. Motivic cross-rhythms (*y*).



Example 1–2. continued.

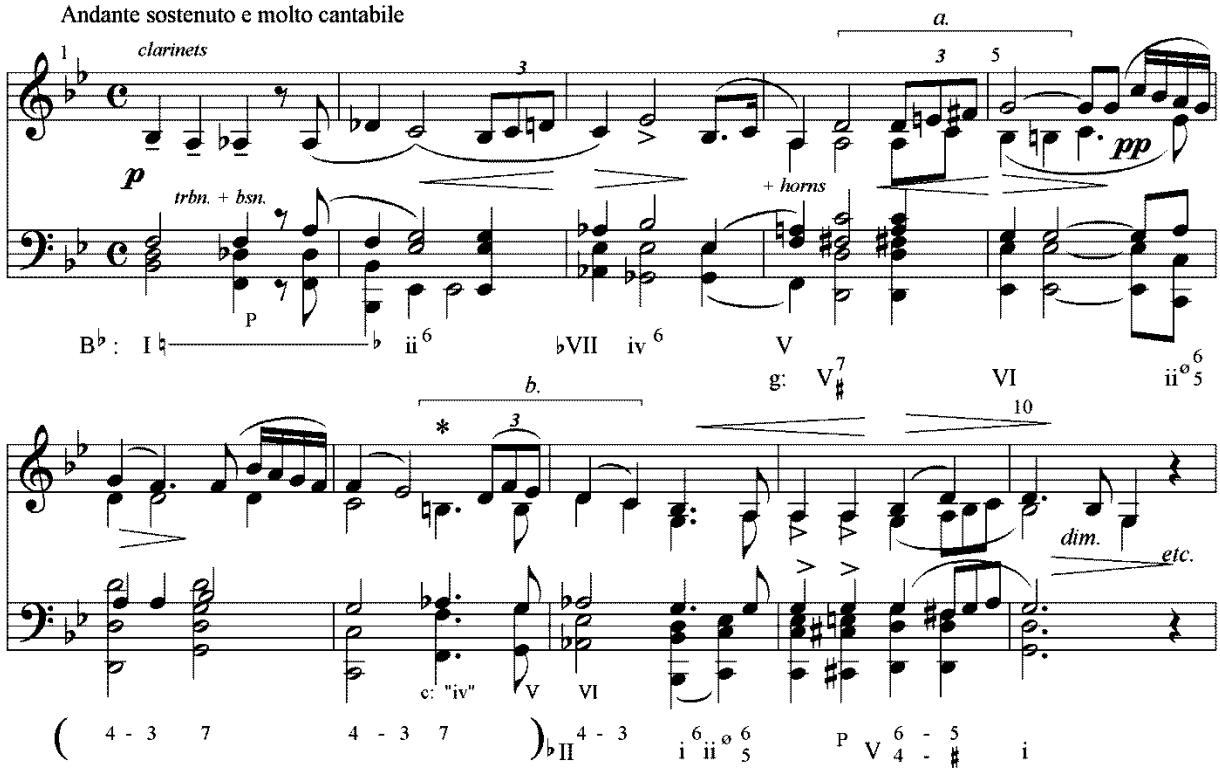
c. Dvořák *Notturno*, mm. 13–16. Rising chromatic motive (*x*).



The three quartets written 1869–70 exhibit Dvořák's grandiosity of vision for his musical ideas, but unchecked development and formally unnecessary repetition led to bloated forms (the D-major quartet is over 70 minutes long); Dvořák's Wagnerian vision does not translate especially well to the string quartet medium. As Clapham has stated, "in all three [quartets] he had not paid sufficient attention to clarity of form and had allowed himself to be carried away by the fertility of his invention."[18] In future chamber music, Dvořák would turn again toward Classical models, but tempered by occasional Wagnerian touches.

[18] Clapham, 163

Example 1–3. Dvořák, Fourth Symphony, op. 13 (1873), ii, mm. 1–10. Wagnerian elements include the triplet figure (*a*) and the suspended augmented fourth over a deceptive cadence (*b*).



Other works from the early 1870s exhibit a strong Wagnerian influence. The second movement of Dvořák's Fourth Symphony, op. 13 (1874), one of the clearest examples of such influence, features an opening chorale whose tonal language and instrumentation is almost slavishly imitative of Wagner's practices (see Example 1–3). Strings are absent for the winds-only chorale comprising trombones, horns, clarinets in their low register, and bassoons. In addition to the rich, dark colors of the orchestration, several rhythmic and harmonic features stand out as notably Wagnerian:

1) the rhythmic profile of the theme is reminiscent of the Pilgrim's Chorus from *Tannhäuser*,[19] especially the ascending triplet figure to a deceptive cadence (see the bracket marked *a*);

2) there is a heavy emphasis on the use of sequence throughout the movement—here, the descending fifths, mm. 5–7, terminate at a deceptive cadence in C minor (m. 8), which acts as the Neapolitan of G minor, the goal of the opening phrase;

3) the augmented fourth suspended over the deceptive cadence at m. 8 (see the bracket marked *b*) is a Wagnerian thumbprint (especially in *Tristan und Isolde*). To highlight his borrowing of the device, Dvořák uses the *Tristan* chord itself as an element of foreshadowing (see the asterisk—though respelled, it contains the same pitch classes as the opening of Wagner's opera).

Though the pervasive use of Wagnerian elements is a feature of Dvořák's early work, isolated borrowing occurs in later pieces as well (see Example 1–4). One of the most obvious comes from *Othello*, op. 93 (1892). This tone poem masquerading as a concert overture virtually quotes the "Magic Sleep" music from *Die Walküre*, a quotation that Clapham refers to as "curious."[20] The Requiem, op. 89 (1890), also contains moments that are more or less reminiscent of Wagner without being quotations. The first instance is a similarity of accompanimental figuration between the "Ride of the Valkyries" and the "Confutatis."[21] The second is a similarity in mood between the overture to *The Flying Dutchman* and the "Dies irae"

[19] *Tannhäuser* was one of Dvořák's favorite pieces throughout his life.
[20] Clapham, 115.
[21] The difference between Wagner's 9/8 time signature and Dvořák's 3/4 is negligible for this accompanimental figure. A programmatic reason might exist for this similarity; both pieces deal with a kind of Judgment Day. That is, the Valkyries collect the souls of the heroic dead and lead them to Valhalla, while the "Confutatis" of the Latin rite describes a penitent soul hoping for salvation while the damned are consigned to an eternity of brimstone and fire.

which derives from Dvořák's orchestration of tremolando strings as accompaniment to thematic material in the brass (especially the second statement of the opening material in which the figuration in the horns includes a repeated open fifth decorated by a grace-note ♭6–5 over the bass).[22]

In all of the examples so far, Dvořák's use of Wagnerian elements would have been problematic in some way according to the stylistic criteria of the time, which were largely predicated on a Romantic German ethos where organic unity and originality in art were considered primary goals. First, many early works more-or-less unsuccessfully imitated the Wagnerian style (the string quartets of 1869–70); the style was wrong for the medium (or genre) and/or Dvořák had not yet learned how to sustain interest over the course of a longer work. Second, even in relatively successful works such as the Fourth Symphony or *Othello*, Wagnerian elements often conspicuously stand out from the prevailing texture, calling attention to themselves so that Dvořák's own originality—his compositional voice as it were—remained somewhat masked.[23]

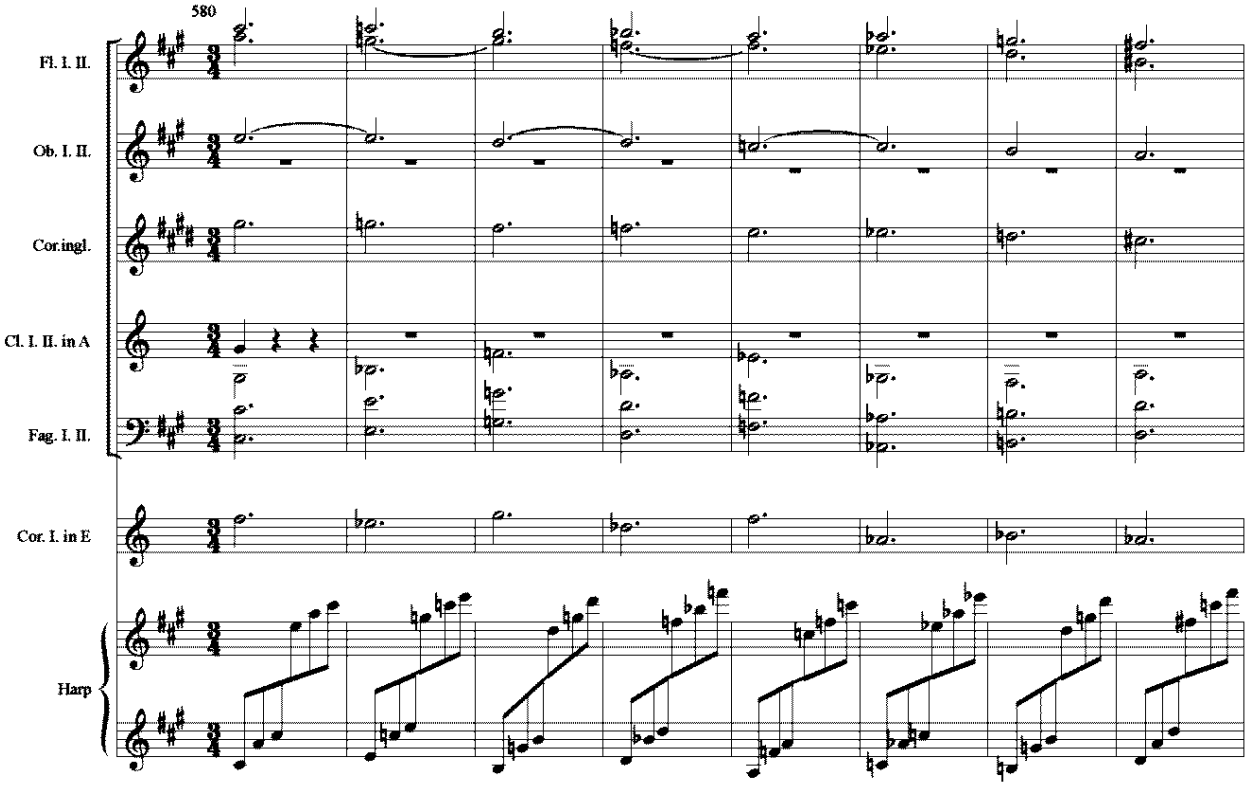
---

[22] Robert Hatten considers a texture defined by an empty fifth to be "marked" with respect to music of the later 1800s because Classical and Romantic styles do not typically employ such a texture; see Hatten, *Musical Meaning in Beethoven* (Bloomington: Indiana University Press, 1994). See Dvořák's use of the empty fifth, then, invites comparisons to other Classic-Romantic pieces that use the same device, such as Wagner's *Flying Dutchman*, but also Mozart's Requiem. Though the tremolos, *forte* dynamic, and arpeggiated swells in the winds here suggest a stronger kinship with the former, an affinity with the latter is observable elsewhere in the work.

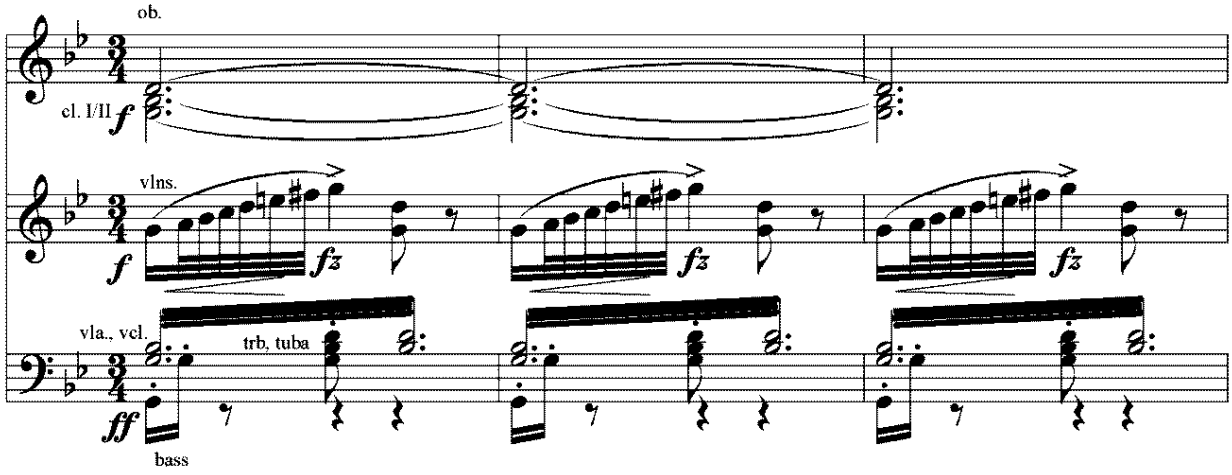
[23] On the issue of the "voice" of the composer, see Edward Cone, *The Composer's Voice* (Berkeley: University of California Press, 1974).

Example 1–4. Several Wagnerian borrowings in Dvořák's later music.

a. Dvořák's borrowing of Wagner's Magic Sleep music in the recapitulation of O*thello*.

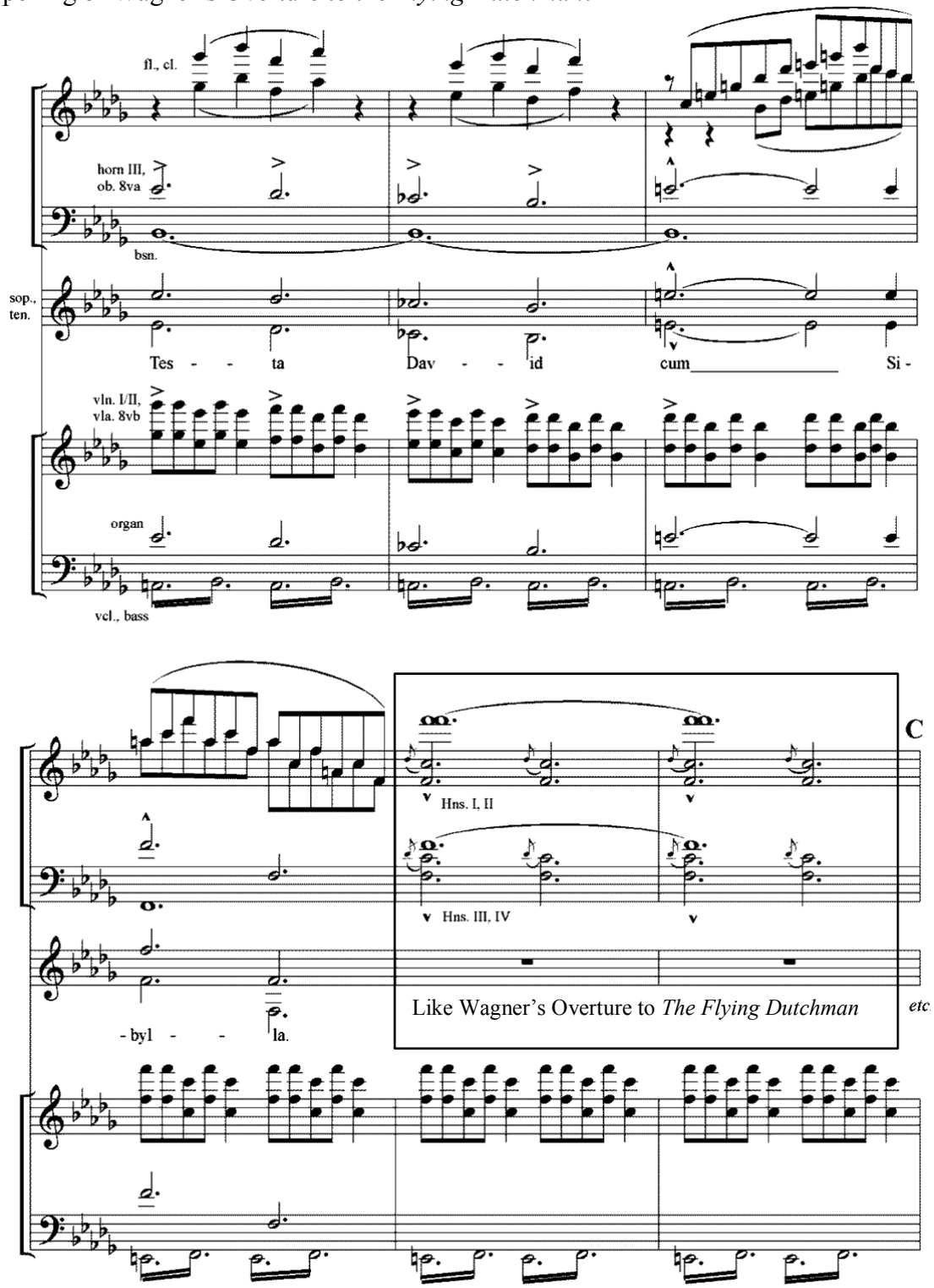


b. The opening of "Confutatis" from Dvořák's Requiem, which resembles the opening of Wagner's "Ride of the Valkyries."



Example 1–4. continued

From the second statement of the "Dies irae" from Dvořák's Requiem, which resembles the opening of Wagner's Overture to the *Flying Dutchman*.

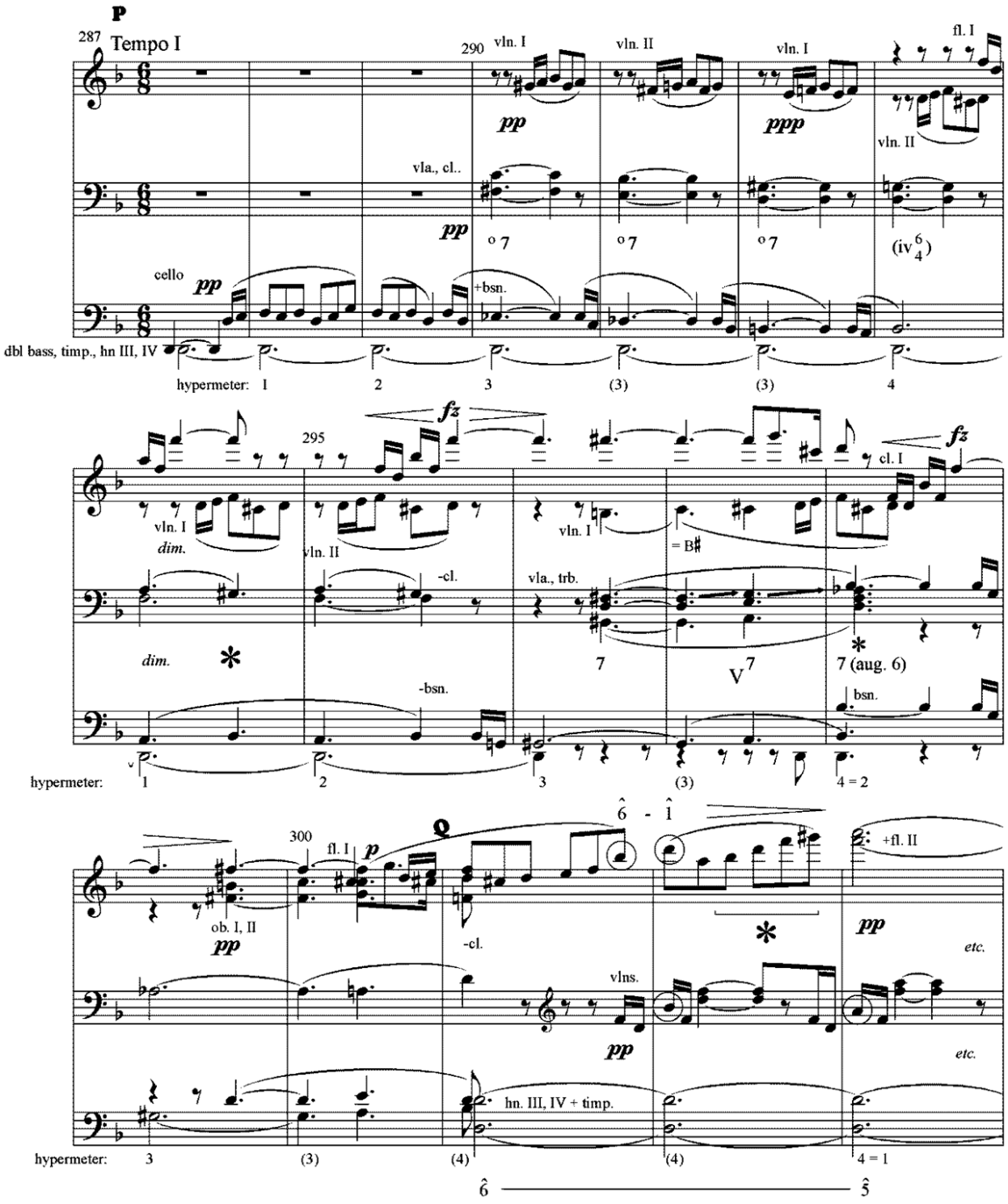


Third, a piece in which Wagnerian elements are not convincingly integrated into the compositional fabric ran the risk of seeming to contemporary audiences a hodge-podge mixture of styles; this is particularly true for the Requiem, which, in addition to the Wagnerian elements quoted above, also features Baroque fugal writing, thematic transformation in the manner of Liszt, and Verdian vocal writing for both chorus and solo voice.[24]

The last example for this section, Dvořák's Seventh Symphony, op. 70, would have been considered by contemporary critics to be a much more successful work than the earlier works just mentioned since the Wagnerian elements have been seamlessly integrated in Dvořák's style. As such, it is both organically uniform and original. It successfully straddles Classic and Romantic harmonic and formal practice, albeit with a heavier emphasis on the former; it is worth discussing a few Wagnerian moments in the piece. That they are interwoven into the fabric of the piece and do not strike the ear as misplaced or awkward is a testament to Dvořák's compositional mastery at this point in his career and also to the care that he took in writing this particular work. The first example comes from within the coda of the first movement (mm. 287–303, beginning at rehearsal letter P); see Example 1–5. This peroration features the dense kind of chromatic writing that Dvořák may never have achieved without first passing through his youthful Wagnerian phase. Here, over a pedal tonic D, a sequence of diminished-seventh chords in descending whole steps decorates a plagal resolution to the tonic, which is in turn decorated by a common-tone augmented-sixth chord (indicated by the asterisk in m. 294).

[24] Stylistic mismatch remains the main charge leveled at the Requiem. In spite of large sections of music that are very well-written, even masterly, and its unifying *idée fixe*, its lack of stylistic cohesiveness across all the movements is probably why it is not better known now—probably also the large number of performers required to mount a production of the work. See Rey M. Longyear and Kate Covington, "Motivic Unity and Harmonic Variety in Dvořák's *Requiem*," *In Theory Only* 12, no. 5–6 (Autumn, 1992), 51–64.

Example 1–5. Dvořák Seventh Symphony, coda to the first movement, mm. 287–303. Salient features include a sequence of fully diminished seventh chords, upward resolutions of chordal sevenths, and common-tone augmented-sixth chords.



More striking is the metamorphosis of this common-tone augmented sixth, through semitonal voice leading, akin to the SLIDE function, to a G♯ half-diminished seventh chord, essentially a chromatic pre-dominant chord, in mm. 295–96.[25] The SLIDE function, identified as such by David Lewin (1987), is a transformational process for *triads*, whereas the concept must be modified to include an additional tone if Dvořák's usage is to be understood (see Example 1–6).[26]

Yet even more striking is Dvořák's treatment of the resolution of this G♯ half-diminished seventh and the following deceptive resolution of the dominant in mm. 296–98: the chordal sevenths resolve up (see the arrows in the second system of Example 1–5). The ascending stepwise lines in the strings and trombones help smooth over these irregular resolutions. (The voice-leading in the repetition of the phrase is more normative.) The flute's salient line, especially with its upward-resolving suspension in m. 297, is reminiscent of the opening of *Tristan und Isolde*. The deceptive resolution of the V^7 in m. 297 reactivates the augmented-sixth sonority (even though Dvořák here spelled it as a B♭ dominant-seventh; one measure later, at the bassoon entrance, he spelled the note as G♯).[27]

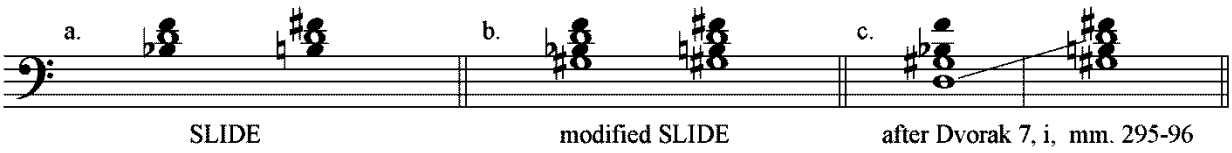
---

[25]Although it resolves irregularly, it satisfies Charles Smith's criterion for a dominant substitute chord; that is, that the operative element is the upward resolution of ♯$\hat{4}$, the dominant's own leading tone. See "The Functional Extravagance of Chromatic Chords," *Music Theory Spectrum* 8 (Spring 1986), 94–139.

[26] See David Lewin, *Generalized Musical Intervals and Transformations* (New Haven, CT: Yale University Press, 1987), 178. Another instance of Dvořák's modified use of the SLIDE function occurs between mm. 24–25 in the "Intermezzo" of the Piano Pieces, op. 52 (1880), in which a C♭ dominant-seventh "resolves" to a C minor triad.

[27] Although the simultaneous enharmonic spelling of A♭/G♯ and the enharmonic treatment of written C as B♯ in m. 297 might suggest a blurring of traditional tonal focus, they are probably written this way for the individual performers' convenience . For a discussion of the importance of enharmonic (re)spelling, see Daniel Harrison, *Harmonic Function in Chromatic Music: a Renewed Dualist Theory and an Account of its Precedents* (Chicago: University of Chicago Press, 1994), 119; and Richard Bass, "Enharmonic Position Finding and the Resolution of Seventh Chords in Chromatic Music," *Music Theory Spectrum* 29, no. 1 (Spring 2007), 81.

Example 1–6. A modified example of the SLIDE function in Dvořák's Seventh Symphony.



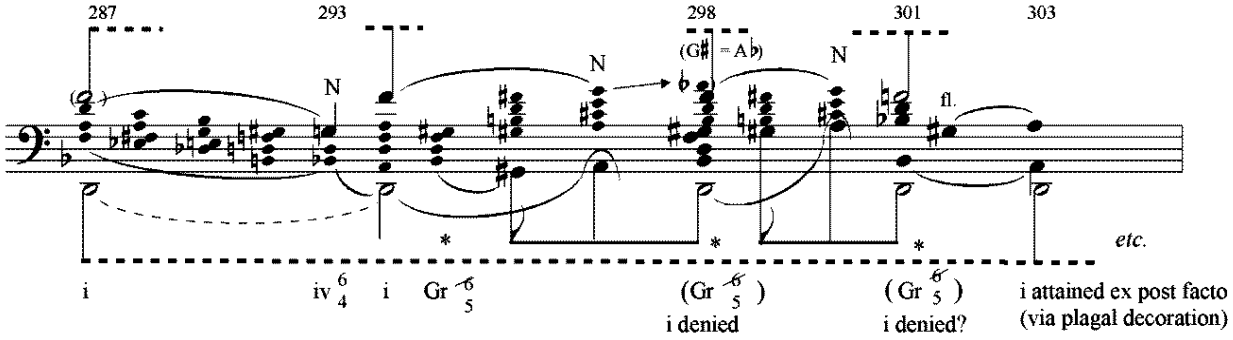
The repeated emphasis on B♭, starting with the iv$^{6}_{4}$ in m. 293, suggest a large scale $\hat{6}$–$\hat{5}$ motion over the tonic pedal, which is most fully expressed in mm. 301–03. The arpeggio in the flute, mm. 300–303, highlights an ascending $\hat{6}$–$\hat{8}$ motion, an emerging hallmark of nineteenth-century practice according to Jeremy Day-O'Connell, while simultaneously recalling the distinctive augmented-sixth sonority of mm. 294 and 298 (see the bracket marked with an asterisk).[28] The violins initially mimic this emphasis on $\hat{6}$, but then "correct" themselves by stating the diatonic version of the D-minor arpeggio.

The Wagnerian aesthetic of endless melody is embodied by mm. 297–303 but is simultaneously analogous to the alternating, repetitive dominant-tonic statements that constitute post-cadential closure in the Classical era, essentially prolonging the tonic. Dvořák's genius lies in the way he adapts this prolongation for a Romantic idiom. By deceptively resolving the dominant sevenths of mm. 297 and 300, he essentially denies a full-fledged authentic cadential closure at the surface without violating the harmonic logic of the deep structure (see Example 1–

[28] See Day-O'Connell, "The Rise of $\hat{6}$ in Nineteenth Century Music," *Music Theory Spectrum* 24, no. 1 (Spring 2002), 35–67. To be sure, Day-O'Connell's article almost exclusively treats the major mode for the non-classical resolution of $\hat{6}$, but does cite Tchaikovsky's Fifth Symphony (1888) in note 39 (p. 55) as one instance of the "improbability of the succession ♭$\hat{6}$–$\hat{8}$." The use of the subdominant (including minor subdominant) increased greatly in the nineteenth century; see Deborah Stein, "The Expansion of the Subdominant in the Late Nineteenth Century," *Journal of Music Theory* 27, no. 2 (Autumn 1983), 153–180). Given such an expansion, it is possible that there is evidence for the increasing use of $\hat{6}$–$\hat{8}$ in minor (and, through modal mixture, its exportation to major-mode pieces), but more research would be necessary to confirm this. At a deeper level, in this case, the surface $\hat{6}$ really does resolve to $\hat{5}$.

7); this is especially true of the resolution in m. 298 where the suspension chord is not allowed to resolve to a root-position tonic before progressing to ♯iv^{o7}. Indeed, the final attainment of the tonic in m. 303 is through the common-tone resolution of the augmented-sixth, a variation of the oft-used post-cadential plagal resolution of the Baroque and Classical eras.

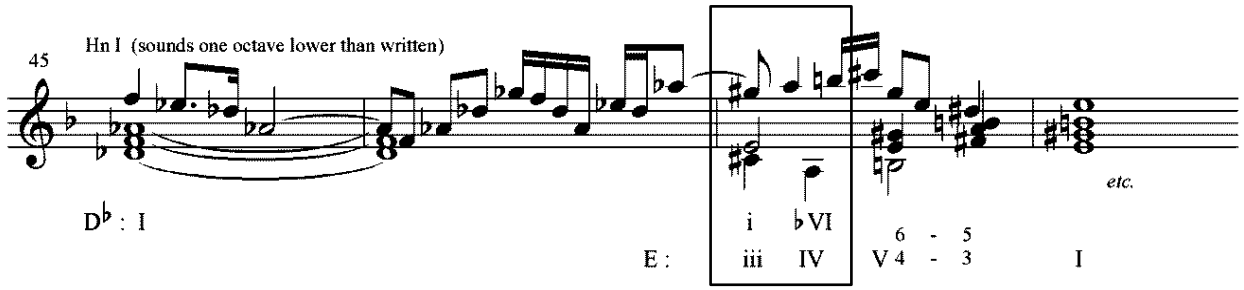
Example 1–7. Middleground reduction of the beginning of the coda and post-cadential plagal coloring.



The middle of the second movement has several more or less Wagnerian moments, the last of which is the most prominent. First, in m. 40, there are climactic hammer-strokes reminiscent of "Siegfrieds Tod und Trauermarsch" from the third act of *Götterdämmerung* (1874). Secondly, in m. 46–47, the horn solo (see Example 1–8) leads a modulation away from D♭ major via A major to a cadence in E major. The swift, smooth modulation is here effected by 5–6 motion above C♯, leading to an A major pivot chord (♭VI of D♭ major/minor becoming IV of E).[29]

[29] Although similar modulations can be found in music by Schubert and Brahms, this example's rising 5–6 motion effecting a chord change, and its placement between the evocations of the "Trauermarsch" and *Tristan* cadence (to be discussed next) in this movement lead me to group it with Dvořák's Wagnerian techniques.

Example 1–8. Dvořák Seventh Symphony, ii, mm. 45–48. An A-major chord as a pivot chord between D♭ major and E major.



The third and last example is the deceptive cadence in m. 70 involving an augmented fourth suspended above the bass, which is almost a quotation of *Tristan und Isolde* (see the asterisks in Examples 1–9a and 1–9b). Of the three examples from the second movement, this one is the most obviously indebted to Wagner (and one that Dvořák had used before in a Wagnerian context; refer back to Example 1–3, m. 8 for an example from Dvořák's Fourth Symphony). The striking cadence calls attention to the seemingly semitonal juxtaposition of the keys E major and F major.[30] However, as Leslie Kinton points out, the arrival on F in m. 70 is not yet a return to the tonic, but rather a consonant support for the A, itself a passing tone between B to G (within a larger linear descent from C♯ to E).[31] Because the deceptive cadence is

[30] Here, even though the local E chord is V^7 of A, it is an outgrowth of an earlier tonicized E major, hence its identification as a key area. For Classic-era use of similar idiosyncratic semitonal juxtapositions of key areas at formal junctures, see Beethoven, op. 1, no. 3, iv, which moves directly from C minor to B minor. In fact, many of Beethoven's formal plans, especially in C minor, employ some sort of surprising semitone shift, cf. Michael Tusa, "Beethoven's 'C-minor mood': Some Thoughts on Structural Implications of Key Choice," *Beethoven Forum* 2 (Lincoln, NE: University of Nebraska Press, 1993), 1–27.

[31] See Leslie Kinton, *A Documentary Study and Schenkerian Analysis of Dvořák's Symphony in D Minor, op. 70* (Ph.D. diss., University of Toronto, 2008), esp. his discussion on pp. 166–68. What Kinton is describing , without referring to it as such, is Schenker's concept of the "Auswerfen eines Grundtones," that is, a "cast-out root" which stabilizes the harmony but may not represent the melodic bass. In this case, the "tonic" chord of m. 70 might be standing in for the typical I^6 of an auxiliary cadence (which, if actually used, would have yielded an unbalanced voicing of the chord, given that the melodic line resolves to A). For Robert Snarrenberg's discussion of the concept of the cast-out root, see "The Art of Translating Schenker: A Commentary on *The Masterwork in Music*, vol. 1," *Music Analysis* 2–3 (Autumn 1996), 321.

structurally integrated in this way, the Wagnerian reference, though salient, is not merely a gratuitous sonic indulgence.[32]

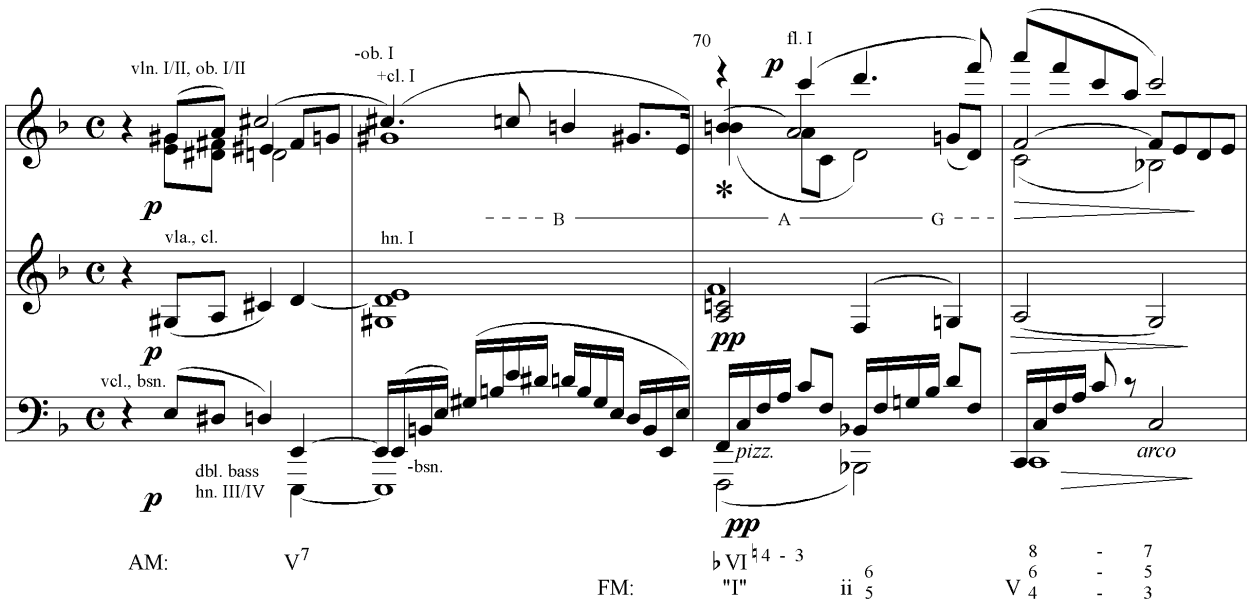
We have seen how Dvořák was able to seamlessly incorporate Wagnerian elements (especially extreme chromatic saturation) into his fully mature style after a more imitative youthful period. Between these two periods we see him experimenting with other modes of expression. That is to say, after Dvořák's youthful "Wagner fever" broke, he turned toward the music of Smetana for inspiration, consciously employed Slavonic elements, and continued his study of Classic models. Dvořák probably realized that it was possible to lose himself and his unique compositional voice in Wagnerian excess, that Wagnerian proportions often work poorly in the more intimate genres of chamber music, and that the politics of the Bohemian musical climate of the early 1870s were aligned against the use of Wagnerism by Czech composers.[33] Smetana in particular had been castigated for adhering to closely to a Wagnerian agenda in some of his operas; it was partially to the non-Wagnerian elements of Smetana's music, then, that Dvořák turned for inspiration, especially for the second version of the opera *King and Charcoal Burner*.

[32] In comparing the sketches of this passage to the final version, we find an example of the care that Dvořák took with his craft. Initially, he chose to resolve the V^7 of m. 69 to A major, thus beginning the following section away from the tonic of F major. His final choice, to use the deceptive resolution as a kind of "back door" resolution to the F major tonic, yields a carefully considered result that is as beautiful as it is surprising. Cf. Kinton's dissertation discussion of this passage, pp. 47-49, and the cuts made to the second movement in general.

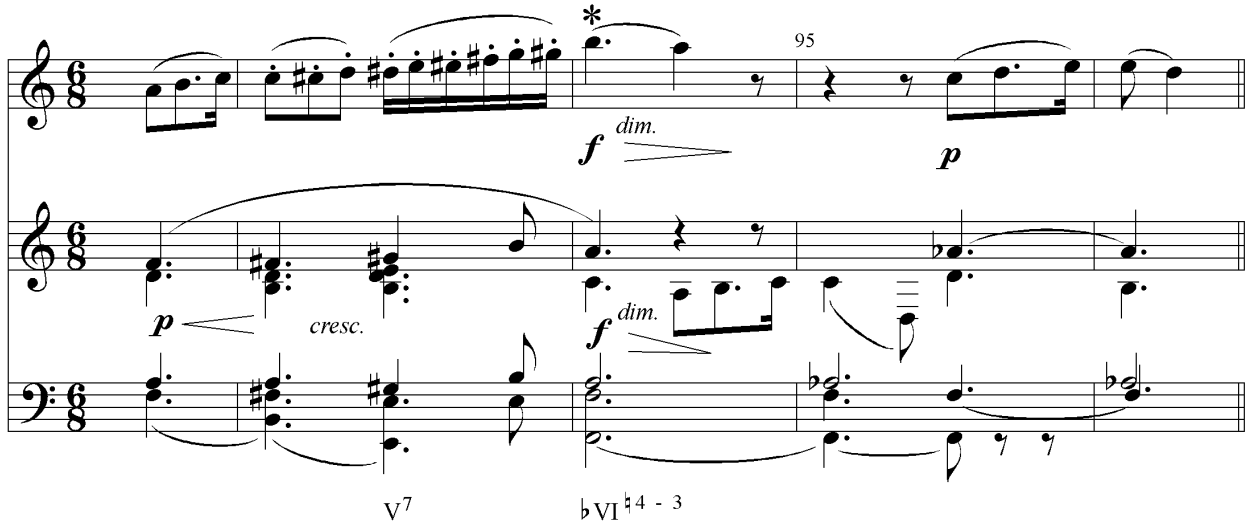
[33] See Burghauser, "Smetana's Influence on Dvořák's Creative Evolution," 43–53. Cf. note 37 below.

Example 1–9.

a. Dvořák Seventh Symphony, ii, mm. 68–71. Characteristic 4–3 suspension over a deceptive cadence (marked by an asterisk).



b. From the Prelude to Wagner's *Tristan und Isolde*, mm. 92–96. Characteristic 4–3 suspension over a deceptive cadence (marked by an asterisk).



Smetana.

Burghauser, Clapham, and Döge all see 1874 as a significant turning point in Dvořák's stylistic development. This was probably motivated in part by self-criticism; he could also see that Smetana's nationalist operas like *Brandenburgers in Bohemia* and *The Bartered Bride* were quite successful. So Dvořák turned away from Wagnerism and renewed his interest in Classical-era symmetries and proportions. Smetana was influential, functioning as a sort of elder statesman in the formation of a nascent ideology of Czech nationalism; his operas and tone poems were crucial in this formation of Czech musical identity (and often overshadow his more cosmopolitan chamber music). Although his influence on Dvořák was not as obvious as Wagner's, it is nonetheless important. My concern in this chapter is chiefly with the development of Dvořák's harmonic language, but, to fully locate and understand Smetana's influence on Dvořák, a review of some shared biographical information will be useful. This review has the added benefit that it may strengthen my argument regarding Dvořák's consumption of Smetana's music and musical aesthetic around the time he turned away from Wagner's music.

Dvořák's familiarity with Bedřich Smetana (1824–84) and his music began in the early-1860s. Until then, from 1856 to 1861, Smetana had been working abroad in Göteborg, Sweden.[34] He returned to Prague in 1862, with the hopes of directing the newly formed Czech Provisional Theater (Dvořák played viola in the theater orchestra until 1871). To his

[34] This summary of the contact between Dvořák and Smetana is based on Clapham's *Antonín Dvořák, Musician and Craftsman* and *Dvořák* (London: David and Charles, 1979); Burghauser's "Metamorphosis of Dvořák's Image in the course of time" in *Rethinking Dvořák*, David Beveridge, ed. (New York: Clarendon Press, 1996), and "Smetana's Influence on Dvořák's Creative Evolution," 43–53; and "Smetana" by Marta Ottlová and John Tyrrell, *New Grove Dictionary of Music and Musicians, 2nd ed.*, ed. Stanley Sadie and John Tyrrell, vol. 23 (New York: MacMillan, 2001), 537–58.

disappointment, the post went to Jan Nepomuk Maýr and it was not until 1866 that Smetana assumed direction of the Czech Provisional Theater where, later that same year, he conducted the premieres of two of his important operas, *Braniboři v Čechác* ("The Brandenburgers in Bohemia") and *Prodaná nevěsta* ("The Bartered Bride"). These operas were important not only because they were Czech-language operas in a land that had, to that point, very few operas in its native tongue, but also important because they illustrated to Dvořák that there existed means other than Wagner's for writing successful contemporary operas.[35]

Another occasion for contact between Dvořák and Smetana occurred at the newly formed Umělecká Beseda (Artist's Society), founded 1863, of which Smetana was chairman of the music section. Here, with Smetana as conductor, Dvořák played Berlioz's *Romeo and Juliet* for the Shakespeare Centenary celebrations of 1864. Dvořák and Smetana also enjoyed the support of Ludevít Procházka, a court official with extensive musical training (some of it at Smetana's piano school). Procházka co-founded an important choral society, Hlahol, in 1861, and was the editor and/or music critic for several important periodicals, giving him a pulpit from which to preach his affinity for the music of Smetana, and later, Dvořák.[36] Procházka also hosted informal musical concerts; Dvořák's inclusion as a composer in these concerts starting in 1871 helped secure his reputation as an up-and-coming composer.

Smetana supported Dvořák's early compositional efforts by conducting, at various times, the overture to *King and Charcoal Burner* (second version), the Third Symphony, and the scherzo of the Fourth Symphony, as well as attempting to mount a production of *King and*

[35] Although Austrian officials maintained that German was the official tongue of Bohemia, opera in Czech was one symptom of the rising tide of nationalist feeling that eventually led to a restoration of the Czech language, at least regionally, to an official status.

[36] In 1873, the Hlahol performed Dvořák's *Hymnus: Dědicové bílé hory* (Hymn: the Heirs of the White Mountain), op. 30, a patriotic cantata for male voices and one of his first true successes as a composer.

Charcoal Burner at the Provisional Theater (ultimately scuttled due to the difficulty of the music and inexperience of the singers engaged for the production).

It is likely that through their contact through the Provisional Theater, Umělecká Beseda, and Procházka's concerts, as well as Smetana's willingness to assist launching Dvořák's career, Dvořák was sympathetic to Smetana and his music. He supported Smetana in the early 1870s when the latter was under attack from certain quarters for his use of "Wagnerisms," especially in the opera *Dalibor* (1868). In 1872, Dvořák and other artists signed an open letter, a sort of petition, supporting Smetana both as a composer and as the continuing director of the Provisional Theater.[37] Later, in 1882, Dvořák helped co-found *Družstvo ctitelů Smetanových*, a society dedicated to Smetana.[38] Further, Dvořák was probably not indifferent to the similarities of their respective situations: they both harbored an enthusiasm for Wagner in the polarized music-political climate of 1870s-era Prague while being drawn simultaneously toward the Classical ideals of symmetry and balance.

Dvořák, then, in his turn away from Wagner, would probably have been most interested in the non-Wagnerian aspects of Smetana's compositional style. John Tyrell tells us that Smetana was against using Czech folk music as a basis for national style, but goes on to say that "there are, however, pseudo-folksongs and/or choruses in all of Smetana's operas. The

---

[37] In a nutshell, some commentators felt that Wagner's (German) aesthetic was anathema to an authentic Czech style, which should be based on folk music and rhythms; others argued that a true Czech style would embrace progressive elements. For further background on Smetana's struggles with Prague critics, see Marta Ottlová and Milan Popíšil, "K motivům českého wagnerismu a antiwagnerismu" (Regarding the Motives of Czech Wagnerism and Anti-Wagnerism) in *Povědomí tradice v novodobé české kultuře* (Consciousness of Tradition in Modern Czech Culture) (1988), 137–54; also available in German as "Zu den Motiven des tschechischen Wagnerianismus und Antiwagnerianismus" in *Oper heute*, vol. 9 (1986), 165–82. Burghauser also sums up the controversy in English in "Smetana's Influence on Dvořák's Creative Evolution," 43–53, noting that the aesthetician Otakar Hostinský was an ardent supporter of Wagner's polemics and lauded these "progressive" elements in Smetana's music. Hostinský's stance would become an important basis for later Czech writers, especially Zdeněk Nejedlý and František Bartoš, both of them pro-Smetana and anti-Dvořák (whom they felt was too cosmopolitan to be truly representative of an authentic Czech style).

[38] Burghauser translates the name as "Society of Venerators of Smetana." Döge translates it as the "Association of Smetana's Followers."

suggestion of folksong was usually made by the use of strophic structures, repetitive tunes and variable meters or tempos."[39] It is important to note that Dvořák, following Smetana's ideology, rarely quoted folk song but often emulated it and also used many of the dance forms.[40] Also of utmost importance to the understanding of the development of Dvořák's harmonic language is the pentatonic and/or modal melodic profile of folk tunes.

Tyrell does not overlook the importance of rhythm in folk music. He states that for Smetana, with regard to vernacular music, dance rhythms were more important than folk tunes. The most important of these rhythms was the polka, although Smetana frequently used the *sousedská* (a triple-meter dance in the manner of a waltz or landler), and the *skočná* and the *furiant* were used in *The Bartered Bride*. Dvořák and Zdeněk Fibich, perhaps inspired by Smetana's use of the polka to musically represent the Czech people, had used this dance in place of a minuet or scherzo in their chamber music. Smetana, too, would later use a polka in place of a scherzo in his First String Quartet, "From my Life" (1876).[41]

In terms of composers who influenced Smetana's musical language, Wagner has already been mentioned. To this we can add Liszt, whom Smetana had visited in Weimar in 1857. Marta Ottlová also mentions Mendelssohn, Schumann and Chopin with regard to Smetana's piano music.[42] Jan Smaczny has explored the influence of Schubert upon Smetana—important here is Smetana's inclusion of Schubert's Ninth Symphony on a concert of the Provincial

---

[39] Ottlová and Tyrell, "Smetana," 544.
[40] The idea of emulation without quotation becomes something quite important for writers analyzing "American" musical elements in Dvořák's Ninth Symphony, especially with regard to just how original or derivative certain melodies are—the theme of the Largo, for example.
[41] Ottlová states that Smetana followed the precedent of Dvořák and Fibich. She does not seem to consider where Dvořák and Fibich found their motivation. This may be a case where Smetana is following a precedent he himself may have inspired, see Ottlová and Tyrell, "Smetana," 545.
[42] Ottlová and Tyrell, "Smetana," 547–48.

Theater in 1869 while Dvořák was still playing in the orchestra.[43] Thus, we can see several significant overlaps between Smetana's influences and the young Dvořák's, the notable exception being Schubert. It seems, however, that Smetana was both an indirect and direct conduit between Schubert and Dvořák: indirectly because Dvořák took Smetana's music as a model in the mid-1870s and Smetana's style was, in part, influenced by Schubert (particularly chromatic modulations), directly because Smetana actually programmed Schubert's works on concert programs, of which Dvořák was either a performer or listener.

Smetana's influence is strongest in Dvořák's operas and tone poems. Burghauser tells us that in the second version of *King and Charcoal burner*, Dvořák's former allusions to a Wagnerian style "here yield completely to the influence of Smetana."[44] The elements that he borrowed from Smetana were not harmonically radical like those of Wagner. Rather, Dvořák followed Smetana's ideology of loose emulation of folk elements rather than wholesale quoation; he borrowed certain of Smetana's orchestrations and textures; and he was inspired by Smetana's conception of the tone poem as a vehicle for nationalist expression. Inspired by this ideology, Dvořák's increasingly used nationalistic elements in his music during what Döge calls his "first Slavonic period" (roughly mid-1870s–1881). Although I will deal with a few obvious Slavonic elements here, a more thoroughgoing discussion can be found in the digression below entitled "On ethnic/national coloration," pp. 37–49.

In his discussion of the Slavonic Dances, opp. 46 and 72, Clapham presents a good précis of Dvořák's practice of folk song emulation.[45] Although there are obvious, sometimes striking, similarities between Dvořák's melodies and various folk-songs, these similarities usually

---

[43] Jan Smaczny, "The Schubertian Inheritance among Czech Composers," 61–75.
[44] Burghuaser, "Smetana's Influence on Dvořák's Creative Evolution," 49.
[45] Clapham, *Antonín Dvořák, Musician and Craftsman*, 135–145

represent, at most, a paraphrase of the folk tune. More often they replicate salient rhythmic and/or motivic features of the melodies without resort to quotation or paraphrase. Smetana broke his own general rule of folk song emulation when he appropriated the Hussite choral "Ktož jsú boží bojovníci" (Those Who Are God's Warriors) for *Tábor* (1878) and *Blaník* (1879), the final two symphonic poems of *Má vlast*. Dvořák was to use this theme as well for his *Hussite* Overture (1883). Due to the explicitly nationalistic mood of these pieces, the two composers probably considered actual folk song quotation to be aesthetically acceptable. That is, in spite of the fact that both Smetana and Dvořák are on record expressing their dislike of actual folk song quotation, the inclusion of a well-known Czech hymn—as opposed to a vague evocation of folk song elements—would immediately identify a piece as patriotic or nationalist to the audience. In a similar patriotic vein, Dvořák also quoted two well-known melodies, including the Czech national anthem, for his overture to the incidental music to the nationalist play *Josef Kajetan Tyl* (1882, subtitled "My home"); Dvořák remains true to his ideology, however, as he treats the melodies with some freedom so that the quotations are not always exact.

In addition to following Smetana's aesthetic for folk songs, Dvořák sometimes borrowed relatively unique ensemble textures from him. As an initial example of Dvořák's of this, we can turn toward their respective chamber music. Clapham hears the opening of Dvořák's String Quartet in F Major, op. 96, "American," as modeled after the opening of Smetana's String Quartet in E Minor, "From my Life;" they both contain a viola melody accompanied by violin tremolandos and pedal point in the cello.[46]

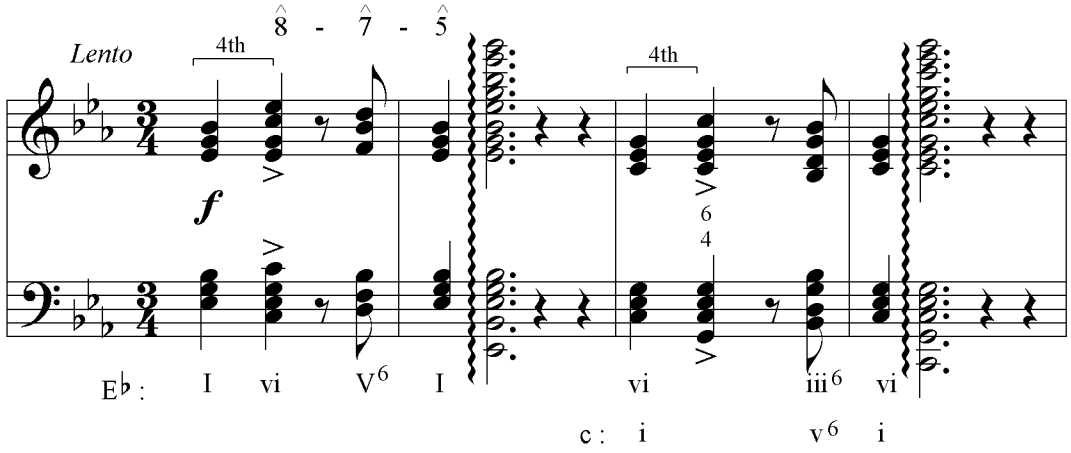
A more concrete example of textural borrowing comes from the beginning of Dvořák's orchestral Third Slavonic Rhapsody (1878), which uses a harp introduction much like Smetana's

[46] Beckerman hears this also, and suggests the op. 96 is then somehow from Dvořák's life (that is, interpretable as an autobiographical statement); see *New Worlds of Dvořák*, 142.

Vyšehrad of 1874 (from the cycle *Má vlast*, "My Homeland"), which begins with harps alone (see Example 1–10).[47] Clapham makes a bit too much of the motivic leap of a fourth between the two openings; perhaps more salient is the emphasis of both pieces on iii^6, a chord that might be considered modal.[48] Certainly Dvořák's use of the chord is more conventional given its resolution to a true dominant, but in terms of length, which gives the passage a certain harmonic coloring, iii^6 is more salient than V^7. In contrast, Smetana's use of iii^6 prolongs vi emphasizing the "secondary chords" of the key. If analyzed in C minor, the use of minor v^6 would still be considered modal (especially since the second statement is not truly sequential—sequence typically being used as an heuristic for non-functional chord successions).

Example 1–10.

a. Smetana, *Vyšehrad* opening (scored for two harps). Motivic leaps of a fourth and the "falling away from the from the leading tone" topic.

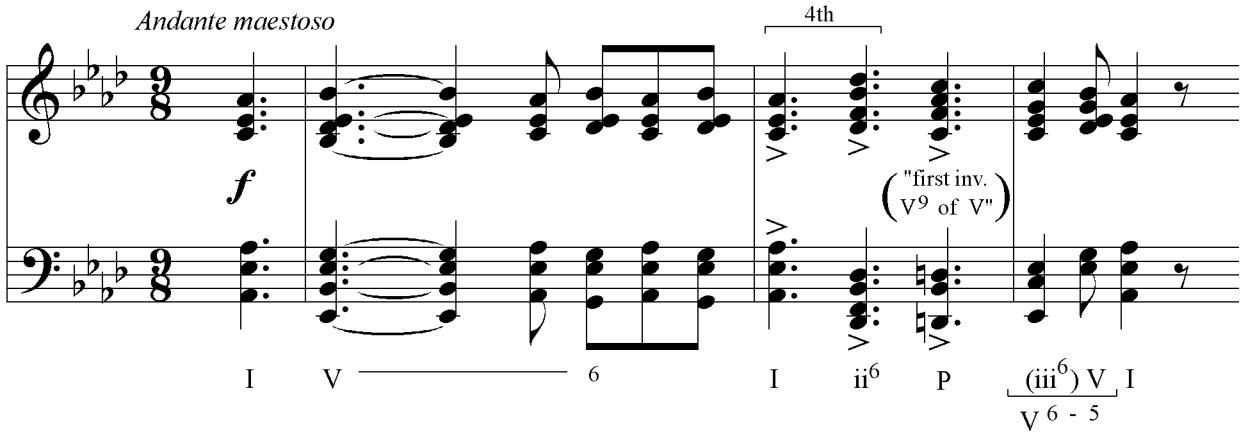


[47] Fibich has the distinction of being the first composer to write a nationalist tone poem on a Czech subject, *Záboj, Slavoj a Luděk* (1873). Because of its prominent harp part, John Tyrell even claims that it inspired Smetana's *Má vlast* (but Smetana began *Vyšehrad* in 1872, so this evidence seems circumstantial at best).

[48] Nicole Biamonte, *The Modes in the Music of Beethoven, Schumann, and Brahms* (Ph.D. diss., Yale University, 2000), esp. p. 79 in which she discusses the "secondary" triads of a major key: ii, iii, and vi.

Example 1–10. continued.

b. Dvořák, Slavonic Rhapsody no. 3 opening (one harp). Possible motivic fourth.



Although Dvořák's Slavonic Rhapsodies are not programmatic in the same way that the six tone poems of *Má vlast* are, their identification as "Slavonic" and their avoidance of sonata form suggest a more poetic orientation in line with Smetana's conception of the nationalist tone poem. One last imprint of Smetana's *Má vlast* can be found in a specific melodic shape: the characteristic falling away from the leading tone that starts the main theme of *Vyšehrad*.

A final but slightly more tenuous example of a textural borrowing is the similarity in mood between Smetana's Piano Trio in G Minor, op. 15 (1855) and Dvořák's early piano trio in the same key (op. 26, 1876). Not only are both pieces solidly in the classical tradition (i.e., no formal experimentation and no ethnic/national melodic or harmonic elements), but they were both written directly after the death of one of the composers' daughters. Thus, there may be a biographical underpinning for the similarity, especially given the fact that Dvořák wrote relatively few pieces in the minor mode at that time.[49]

[49] During the period 1875–77, out of about thirty compositions, Dvořák wrote only three large works in the minor mode, including this Piano Trio in G Minor, the Piano Concerto in G Minor, and the *Stabat Mater*, the latter of

Like the nationalist-themed tone poems of Smetana, Dvořák's late tone poems take Czech folklore as their basis.[50] Unlike Smetana, however, whose works in this genre depict castles or rivers, Dvořák used the medium to represent full stories. For the most part, Dvořák drew on the work of Karel Erben (1811–1870), namely the *Kytice z pověstí národních* ("A Bouquet of National Legends") of 1853 which contained thirteen folk tales. Despite the lack of concrete musical references to Smetana in Dvořák's late symphonic poems, we should not overlook the importance of Smetana's ideological use of the tone poem as a vehicle for nationalist expression; its influence on Dvořák's choice of this medium for his own expression of Czech identity cannot be overlooked. Indeed, Janáček felt these late symphonic poems of Dvořák's to be the most completely Czech pieces in his entire output.[51]

As a model, Smetana's role in Dvořák's musical development was to clear a path to nationalist expression, although Dvořák would end up embracing a more pan-Slavonic form of expression than Smetana himself would.[52] Beyond the rhythms of national dances, the exact constitution of such Czech or Slavonic musical elements is vague. It is worth exploring this subject, both tangential and important to the overriding concern with Dvořák's harmony, in a bit more detail.

---

which, despite the danger of incorporating personal details into the genesis of pieces within a composer's oeuvre, some commentators have seen as also inspired by the death of his daughter.

[50] Anticipating Dvořák's explicit folklorist basis for tone poems, Fibich had composed his own tone poem, *Toman a lesní panna* ("Toman and the Wood Nymph"), in 1874–5 on the poetry of František Čelakovský.

[51] Cf. Clapham, 118.

[52] In fact, Smetana's second set of Czech Dances for piano (1879) was a response to Dvořák's first set of Slavonic Dances (1878), which he felt were insufficiently Czech. He probably would not have known Dvořák's Czech Suite, op. 39 since it also dates from 1879.

Digression: **On ethnic/national coloration.**

Given the preceding discussion of Smetana and his importance for the Czech national school, it is now appropriate to discuss the idea of ethnic/national coloration in Dvořák's music. Such coloration can include localized juxtaposition of keys, melodic and/or harmonic modality, folk song reference, etc. and are thus appropriately discussed under this chapter's large rubric of "harmony." Other national traits, such as rhythms from dance forms or speech patterns, will be discussed only inasmuch as they pertain to the immediate point.

It is not coincidental that the formation of a Czech national style, beginning with Smetana and continuing through Dvořák, began around the same time as the burgeoning political nationalism of states within and around the Austrian empire of the Habsburgs. For example, the Austro-Prussian war of 1866 is roughly concurrent with the premieres of Smetana's operas *The Bartered Bride* and *Brandenburgers in Bohema*. The *Ausgleich*, or Compromise of 1867, that equalized Hungary's status within the empire is roughly concurrent with Smetana's opera *Dalibor* (1868). Dvořák's first overtly Slavic pieces were written in the aftermath of the Franco-Prussian war of 1870 after which the specter of a supremely powerful Germany loomed over Austria and France.[53] These political shifts help explain the polarized and politicized musical climate in 1870s Prague; the presence of Wagnerian harmony in a composer's work could have been seen as somehow expressing sympathy with a German political agenda. The incorporation

[53] Milan Kuna sees Dvořák's Slavic expression beginning as early as the String Quartet in D Major (1869). Its third movement is based on "Hej Slovane!" (Hey Slavs!), a tune that was originally Polish, but was popular in Bohemia; as the de facto Czech national anthem, it was officially forbidden by Austrian officials. See Kuna, "Dvořák's Slavic Spirit and his Relationship to Tchaikovsky and Russia," in *Rethinking Dvořák*, ed. David Beveridge (New York: Clarendon Press, 1996), 143–54.

of Slavic nationalistic musical elements by Smetana and Dvořák was a palliative tonic for Czech audiences, then, curing the ills of politically freighted New German chromatic harmony.[54]

Most commentators agree that large portions of Dvořák's output are overtly nationalistic, and that even the most Classically oriented pieces (such as the Seventh Symphony, op. 70, and Piano Trio in F Minor, op. 65) have their occasional "Czech moments." How exactly this is communicated in music is somewhat difficult to classify clearly. Often elements perceived as "Bohemian" in Dvořák's music, such as Lydian fourths or drone fifths, will be equally perceived as indigenously ethnic for other composers. For example, Lydian fourths and drone fifths might be perceived as "Scandinavian" in Grieg's music or "Polish" in Chopin's mazurkas. Carl Dahlhaus has stated that "without a picture to pinpoint a milieu, or a caption to suggest a country of origin, the ethnic elements inserted into a European art composition are seldom distinctive enough to be pinned down to a particular locale, except perhaps in the case of certain dances."[55] This is aptly illustrated by the well-known anecdote in which Robert Schumann mistook Mendelssohn's Fourth Symphony, "Italian," for the Third Symphony, "Scottish." Often, national elements exist only in the mind of a listener expecting, or receptive to, national elements. Nevertheless, that there is such a thing as a (partially) fungible set of national elements reinforces Dahlhaus's argument that "the crucial point is not the degree to which exoticism is 'genuine,' but rather the function it serves as a legitimate departure from the aesthetic and compositional norms of European music in the context of an opera or a symphonic

---

[54] See Döge, 131. The political climate outside of Prague, especially in Vienna, also affected the reception of Dvořák's work, especially those pieces which would have been perceived by contemporaries to contain more German than Czech aspects; see David Brodbeck, "Dvořák's Reception in Liberal Vienna: Language Ordinances, National Property, and the Rhetoric of Deutschtum," *Journal of the American Musicological Society* 60, no. 1 (Spring 2007), 71–131.

[55] Dahlhaus, "Nineteenth Century Music," trans. by J. Bradford Robinson (Berkeley: University of California Press, 1989), 305.

poem."[56] And of course, this point of departure would also be valid should such exoticism or nationalism exist in traditionally-formed music such as symphonic or chamber works.

Beckerman, citing Dahlhaus and others, has discussed the frustration of trying to define particular elements of "Czechness" in music; as part of his argument, he identifies a cluster of attributes, which although not always unique to Czech music, seem to imply what Dvořák's contemporary listeners (and current ones) would have perceived as nationalistic Czech elements.[57] They are as follows:

1. First beat accent (related to speech and folk song).
2. Syncopated rhythms (often related to characteristic dances).
3. Lyrical passages, often as a trio in a dance-like scherzo.
4. Harmonic movement outlining triads a major third apart.
5. Two-part writing involving parallel thirds and sixths.
6. Oscillation between parallel major and minor modes.
7. Use of modes with raised fourths and lowered sevenths.
8. Avoidance of counterpoint.
9. Use of melodic cells which repeat a fifth above.

Of these elements, I feel the most important are numbers 1 and 7 (first beat accent and modes with $\sharp\hat{4}$ and $\flat\hat{7}$, respectively), although the latter is quite flexible with regard to

[56] Dahlhaus, 302. Although Dahlhaus is likely equating European music with a German musical mainstream, we might profitably define European music as the relatively homogenous Classical instrumental style from a generation or two earlier.

[57] Beckerman**,** "In Search of Czechness in Music," *19th-century Music* 10, no. 1 (Summer 1986), 61–73. A "nationalistic" piece will not need to exhibit all of these attributes, just the way a species of bird, such as an ostrich, need not satisfy all typical criteria for categorization as a bird, for example "flight" or "smallness."

nationality (i.e., contemporary audiences would have perceived these modal elements as Bohemian, Scandinavian, Russian, even Spanish depending on the composer and/or an evocative title). Clapham has stated that Dvořák's Lydian fourths usually occur over a drone bass, and so the issue of modal harmony is avoided; the Lydian fourth is a melodic phenomenon.[58] Some examples of modal melody include: the Lydian fourth in the theme of the Symphonic Variations, op. 78; the lowered seventh in the second song of "In Folk Tone," op. 73; the opening of the second movement of the *Drobnosti*, op. 75a, in which the Lydian fourth occurs in the minor mode (sometimes referred to as a type of Gypsy scale); and, the last movement of the Seventh Symphony, op. 70, in which Lydian fourths color modal arpeggios in m. 150ff; the Romance from the Czech Suite, op. 39; and the tone poem *The Wild Dove*, op. 110.[59] The combination of drone fifths with the Lydian fourth is evocative of bagpipes and so can help to create a pastoral topic.[60]

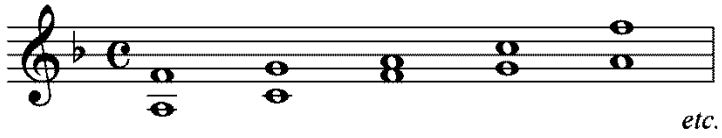
Regarding numbers 1–2 (first beat accent and syncopation, respectively), it is enough to say for now that since Czech and Slovak words are usually stressed on the first syllable and the language contains no articles, melodies do not often begin with an anacrusis. This, and the characteristic rhythms and syncopations from national dances such as the polka or *skočná*, would have added to Czech music a sense of "otherness" when heard by contemporary Western European audiences.

---

[58] For a more rigorous formulation of these terms, "modal harmony" and "modal melody," see my discussion in the next chapter of Nicole Biamonte, *The Modes in the Music of Beethoven, Schumann, and Brahms*.
[59] See also Clapham, "The National Origins of Dvořák's Art," *Proceedings of the Royal Music Association*, 89th Session (1962–63), 75–88.
[60] For in-depth explorations of the pastoral topic, see Leonard Ratner, *Classic Music: Expression, Form, and Style* (New York: Schirmer Books, 1980); Robert Hatten, *Musical Meaning in Beethoven*; and Raymond Monelle, *The Sense of Music* (Princeton: Princeton University Press, 2000).

Numbers 3–5 (lyrical passages, root motion by major third, and two-part writing with parallel thirds and/or sixths, respectively) are almost general enough to be characteristic of nineteenth-century music as a whole. I might profitably expand number 5, however, with another kind of characteristic two-part writing: a pattern expressed by horn-fifths, whose pitch collection is a subset of the pentatonic scale. This is common in much of Dvořák's music, especially as a signifier for a pastoral topic (see Example 1–11). As for number 8 (avoidance of counterpoint), Dvořák often used a non-academic kind of counterpoint in his music, yielding what we might call a *dependent countermelody*. That is, a countermelody which, in and of itself, does not possess enough characteristic detail to stand alone, and is not treated in a strict or formulaic fashion. The String Serenade, op. 22 (1875) has countless examples of this kind of writing.

Example 1–11. Two-part melodic writing featuring horn-fifths (a subset of the pentatonic collection).



To Beckerman's list we can add several other features that would have been perceived as nationalistic by contemporary audiences and critics:

10. The so-called Moravian modulation (see below) and other progressions by step (often containing implicit or explicit parallel fifths and/or octaves).

11. Common melodic elements in folk songs that make their way into Dvořák's concert music, including pentatonicism.

12. Ostinato figures.

13. Certain types of chromaticism, which by themselves might not be nationalistic at all, but in the context of a perceived nationalistic piece, might take on a nationalistic sheen.

The "Moravian modulation" is an abrupt melodic and/or harmonic motion to the key of the subtonic (or flattened seventh scale-degree).[61] It is typically found in minor-mode pieces; the immediate use of a subtonic key area after a tonic key area is characteristic of the Aeolian (natural minor) mode. Dvořák made limited use of this harmonic feature, although, among the more well-known pieces, it can be found in Slavonic Dance no. 12 (op. 72, no. 4) m. 17ff, and in the fourth movement of the "New World" Symphony, m. 44ff. Less common, but still considered characteristic of the Moravian modulation, is a whole-tone relationship between two major keys, I and ♭VII, such as occurs in the Mixolydian mode. The Moravian Duet, op. 38, no. 3 contains just such a progression, as does the String Quintet in G Major, op. 77 (1875), Scherzo (see Example 1–12).[62]

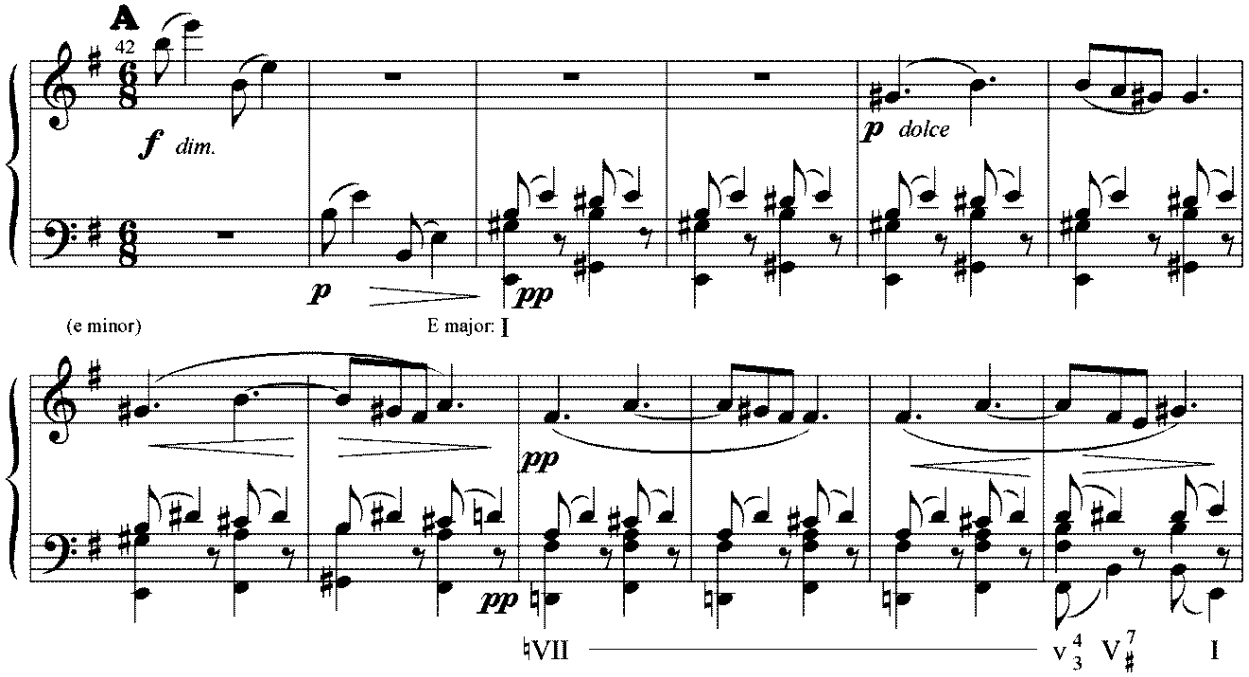
Incidentally, in the subtonic D major section of the latter piece, Dvořák retains G♯ from the local tonic, E major, creating a Lydian fourth; the additional modal reference strengthens the

[61] The term "Moravian modulation" was probably coined, or in any case, popularized by Leoš Janáček, himself Moravian, and is used prominently in scholarly writings about Dvořák and Janáček among others. See Mirka Zemanova, *Janáček: A Composer's Life* (Boston: Northeastern University Press, 2002), esp. p. 61; and Clapham, "The Evolution of Dvořák's Symphony 'From the New World,'" *The Musical Quarterly* 44, no. 2 (Spring 1958), 167–183, especially his Ex. 2c.

[62] To clarify my stance on Roman numeral identification: when I refer in the abstract to the subtonic scale degree or chord, I will write "♭$\hat{7}$" or "♭VII." In specific cases, I will use the accidental that describes the music. Hence, in this example from the String Quintet, I write "♮$\hat{7}$" and "♮VII."

folk-like character of the passage already present due to the pervasive eighth-quarter rhythm (the so-called "Scotch snap" or "Lombard" rhythm). These few examples aside, Dvořák would not often restrict himself only to some version of the progression I/i–(♭)VII when writing falling stepwise progressions, they could occur on varying scale degrees or continue the process beyond the one step. We find this treatment in the first movement of the Fifth Symphony, mm. 73 ff.; Legend no. 10, m. 81ff; and the aforementioned Slavonic Dance no. 12, op. 72, no. 4, m. 79ff (perhaps foreshadowed by the Moravian modulation at m. 17ff). It would not be an exaggeration to say that sequences of this type are something of a hallmark of his style.

Example 1–12. String Quintet in G Major, op. 77, mm. 42–53, Moravian modulation (here, moving from I to ♮VII).



With regard to number 11, it is Clapham who, of Dvořák's biographers, has been perhaps the most concerned with Dvořák's use of folk song for inspiration.[63] He points to certain features that may be traced to folk song origins: the repetition of the initial measure or half-measure of a phrase, the leap from $\hat{5}$ to $\hat{8}$ and back followed by a further descent (usually by step), three-measure phrases, and various rhythmic components related to the dance forms. Another major feature of folk song is its propensity for pentatonic melodies. Dvořák's use of pentatonicism, especially in his American works is well-known, and I discuss such usage in chapter 2, pp. 108–109, in the section headed "Enriched diatonic harmony."

Ostinato plays less of a role in Dvořák's music than in the music of his Russian contemporaries, but we do occasionally find it, especially in the operas. Smaczny has written that as early as his first opera, *Alfred*, Dvořák used ostinato as a figure "to bind together a stretch of music involving groupings of soloist and chorus. In later operas this tendency can be said to amount to a fingerprint…" and calls especial attention to Dvořák's last opera, *Armida* (1903).[64] One example of ostinato in the instrumental concert repertory can be found in the Carnival overture, op. 92 (see the Andante con moto, m. 219, *cor anglais* part). The beginning of the Czech Suite, op. 39, has an ostinato with the character of a sort of oscillating drone; the third movement, a *sousedská* subtitled *minuetto*, has an extremely static section (mm. 51–58) in which only the double basses descend by semitone (sometimes nearly inaudible in performance) beneath an obsessively repeated diminished seventh chord embellished by a double-neighbor figure. Such a passage stands out; its static tension invites hermeneutic reflection. That is, we might ask ourselves why Dvořák included such a passage in a movement that otherwise has

[63] Clapham, "The National Origins of Dvořák's Art," esp. p. 80.
[64] Jan Smaczny , "'Alfred': Dvořák's First Operatic Endeavour Surveyed," *Journal of the Royal Music Association* 115, no. 1 (1990), 89–90.

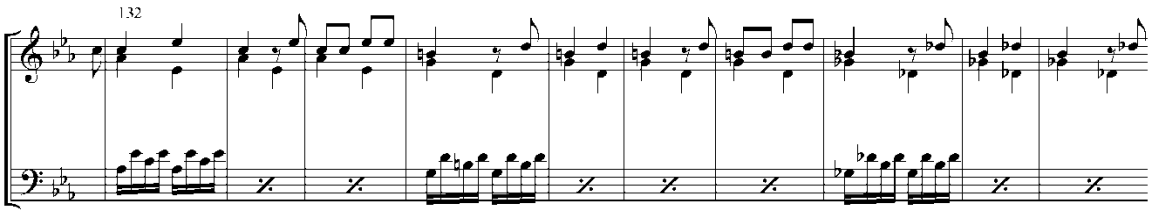
more-or-less steady harmonic rhythm. If we know that the *sousedská* was a slower dance for elderly people, it is not a stretch to imagine Dvořák including a humorous passage in which one of the dancers forgets what their next move is and tries to stall for time.

Number 13 above describes a case in which chromaticism unaffiliated with a particular country may otherwise take on a suggestion of nationalism. A piece that exemplifies this idea is Dvořák's *Vodník* ("The Water Goblin"), op. 107 (1896). It is one of several late symphonic poems based on folk tales from Erben's collection, *Kytice*. Contemporary listeners would most likely have expected a nationalistic work because Dvořák chose to portray a Czech subject in one of Smetana's favored genres, the tone poem. While there are certain Czech elements to the work (most themes lack an anacrusis, for example), its most salient harmonic feature is a coloristic descending whole tone scale (mm. 227ff.), depicting the point in the narrative when the water goblin seizes a maiden and drags her underwater. The nineteenth-century association between Russian music and whole-tone scales lends *The Water Goblin* a certain pan-Slavic tinge that, to many listeners in Western Europe, may as well have been a nationalistic Czech element.[65] Another example might be the two-fold sequential repetition leading from A♭ to G♭ in the first movement of the Eighth Symphony (mm. 132–141, see Example 1–13). The jarring motion by falling semitone (and parallel fifths) is aurally similar to the effect of the Moravian modulation. Kinton calls attention to this passage, writing that "one can almost see [Dvořák] thumbing his nose at the theory pedants who taught him during his student days at the organ school in

[65] Mary Woodside has explored the whole-tone elements of Glinka's operas, notably to portray the sorcerer Chernomor in *Ruslan and Ludmilla* (1842), see "Leitmotiv in Russia: Glinka's Use of the Whole-Tone Scale," *19th-Century Music* 14, no. 1 (Summer 1990), 67–74. This opera would have been well-known by Western European audiences of the late 1800s, along with later Russian works by composers such as Mussorgsky (the "Night on Bald Mountain" of 1867, for instance) and Borodin. Western European composers of the later 1800s were beginning to explore the whole-tone scale as well, notably Liszt (especially in the mid-1860s) and Debussy (who was influenced by the Russians). Therefore, Dvořák's use of the whole-tone scale in this piece is not particularly radical; but it is important because of the "national" color it provides.

Prague."[66] Indeed, the striking effect of the passage, rather than calling into question Dvořák's abilities as a Classically oriented composer, opens what Lawrence Kramer calls a "hermeneutic window."[67] In a movement rife with reference to the pastoral topic, might it not be possible for a passage like the one in Example 1–13 to evoke the simple, bucolic character of a peasant (or at least what a sophisticated, urban listener might think such a peasant character to be)?

Example 1–13. Dvořák Eighth Symphony, i, piano reduction of mm. 132–41. Falling root motion by semitone and concomitant parallel fifths.

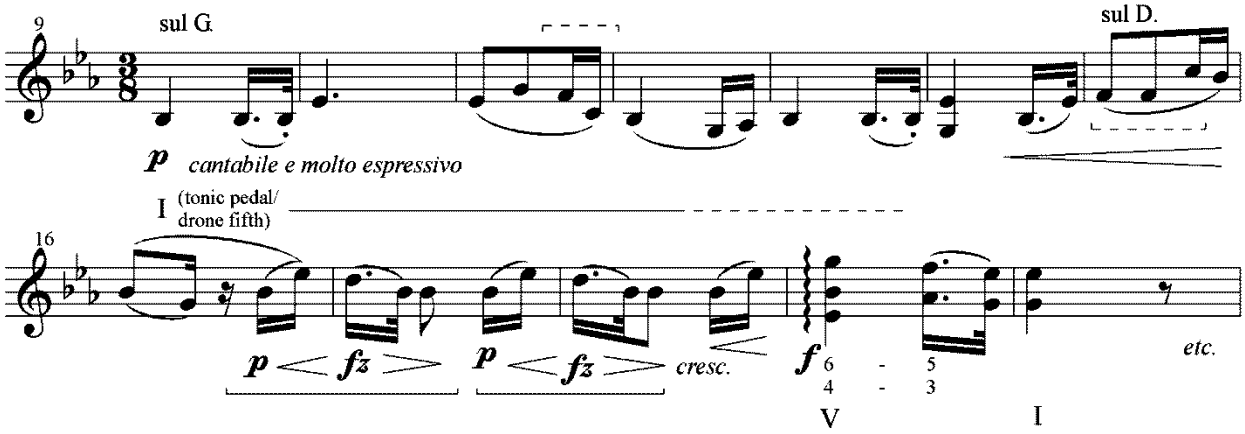


Finally, intertextual relationships between pieces of a certain style or nationality might reinforce elements that are not inherently nationalistic. The primary example I have in mind here is the falling away from the leading tone that begins Smetana's *Vyšehrad* (refer back to Example 1–10). Clapham has stated that this melodic element is not characteristic of Czech folk music. It is, however, a characteristic of Norwegian folk song (descending minor second followed by a descending major third) and by extension, the opening of Edvard Grieg's Piano Concerto in A Minor (1868). Thus, to contemporary critics, a downward resolution of a melodic leading tone, simply because it was nationalistic elsewhere, may have been perceived as a Czech element in Dvořák's music, especially given the added referent of Smetana's *Vyšehrad*. A fairly clear example of this would be in the Adagio from the String Quartet in G Major, op. 106 (Example 1–

[66] Kinton, 9.
[67] See Kramer, *Music as Cultural Practice, 1800–1900* (Berkeley: University of California Press, 1993).

14—solid brackets), which is in the same key as the opening of *Vyšehrad* and whose pitches are in the same order although the rhythm is different.[68] Adding to the nationalistic tint are the tonic pedal/drone fifth grounding the entire phrase up to the cadential six-four and the pentatonic coloring provided by the leaps from $\hat{2}$ to $\hat{6}$ (dashed brackets). A similar falling away from the leading tone can be found in m. 5 of the second movement of the String Sextet, op. 48, a movement subtitled *dumka*.

Example 1–14. String Quartet in G Major, op. 106, ii, Violin I melody, mm. 9–20. "Falling away from the leading tone" topic and modal leaps from $\hat{2}$ to $\hat{6}$.

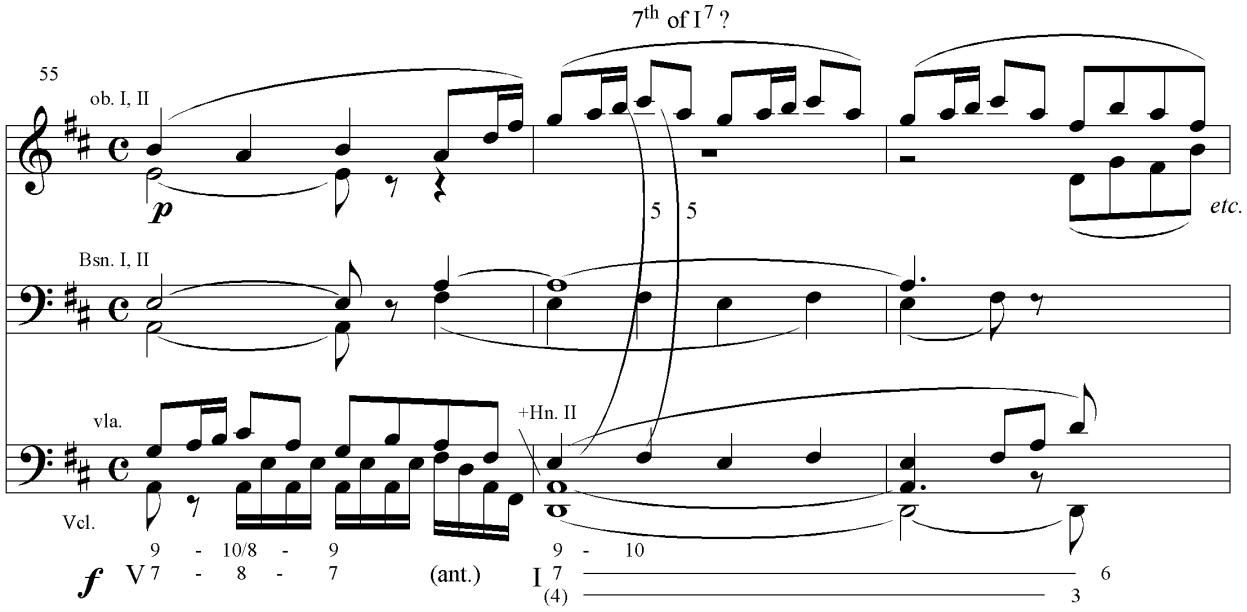


The first movement of the Czech Suite, op. 39, also has a distinctive move away from the leading tone mm. 56–57 (Example 1–15), although it is not of the same sort as the *Vyšehrad* motive. The C♯, acting as the seventh of I^7, eventually does resolve to B (m. 57) at a slightly deeper level as part of a linear descent. There is no real harmonic support for the resolution, and

[68] The leading tones do resolve to the tonic at a slightly deeper level—on the second half of the third beat of mm. 17 and 18—but in each case it is the dominant triad that is on the downbeat so the melodic motion from the leading tone down to the dominant is quite salient.

there is also no high D preceding the C♯ to contextualize it as a passing tone at a deeper level; it stands out. Given the non-academic treatment of the leading tone at the surface, the drone fifth in the celli and horns, the oboe as primary soloist, and the parallel fifths as a result of embellishing passing and neighboring motions, Dvořák is able to create a plaintive, artless affect entirely in keeping with the movement's pastoral topic.

Example 1–15. Czech Suite, op. 39, i, mm. 55–57. Characteristic use of a major seventh within a passage governed by a pastoral topic.



By way of conclusion, we might say that the perception of ethnic or national elements by audiences will be more or less strong depending on their level of stylistic competency.[69] Some lower threshold will exist where enough traits from the lists above combine to create a sense of "Czechness" to the music. This threshold will differ for various listeners. Pieces with many of the traits will more often be perceived by more people as nationalistic. Extramusical qualifiers, such as names of tone poems and subtitles such as "Slavonic" or "American," will further

[69] Leonard Meyer defines and discusses stylistic competency in many of his writings; see, for example, *Style and Music: Theory, History, and Ideology* (Chicago: University of Chicago Press, 1996).

sensitize listeners to expect these aforementioned musical devices, even if the devices are similar across such qualified pieces. That is, a flatted seventh in the major mode may be either Slavonic or American depending on the mindset of the listener. Beckerman, drawing a similar conclusion, has stated:

> Thus we may finally make a distinction between "the Czech style" and "Czechness" itself. While the former may be considered a series of descriptive or analytic generalizations based on the actual characteristics of a body of music, "Czechness" itself comes about when, in the minds of composers and audiences, the Czech nation, in its many manifestations, becomes a subtextual program for musical works, and as such, it is that which animates the musical style, allowing us to make connections between the narrow confines of a given piece and a larger, dynamic context.[70]

Despite our inability to definitively pinpoint a piece as nationalistic or not, existing as it does at the nebulous junction of composer intent and listener expectation, it is worth discussing any aspects that could lead it to be classified as such by educated critic or casual listener alike. Thus, ethnic/national elements belong not only to the joint realms of harmony and form, but also to the realm of hermeneutics.

Schubert and Brahms.

During his visit to America, Dvořák collaborated with Henry Finck on an article about Schubert for *Century Illustrated Monthly*, and wrote:

[70] See Beckerman, "In Search of Czechness in Music," 73. See also his discussion in *New Worlds of Dvořák*, pp. 14–21, in which he writes that "just as a single 'Czech' gesture can infuse a work with the 'Czech spirit,' so too can an explicitly national work like the *Hussite Overture* infuse the larger oeuvre with the odor of nation."

> In originality of harmony and modulation, and in his gift of orchestral coloring, Schubert has no superior. Dr. Riemann asserts with justice that in their use of harmony both Schumann and Liszt are descendants of Schubert; Brahms, too, whose enthusiasm for Schubert is well known, has perhaps felt his influence; and as for myself, I cordially acknowledge my great obligations to him.[71]

After reading these words, directly from Dvořák's own pen, we can forgive early biographers, such as Gerald Abraham, for too easily assuming that Dvořák's entire musical output was subject to the influence of Schubert. Similarities between Schubert's harmonic practice and certain Dvořákian traits, such a fondness for immediate modulations to ♭VI or the easy fluency between relative keys has also led earlier commentators to believe that Dvořák's practice to be derived from Schubert's. To the contrary, the young Dvořák had already been exploiting such harmonic devices, often characteristic of Slavonic folk song, before he became acquainted with the larger part of Schubert's music.[72] Dvořák himself, perhaps recalling that Schubert's parents were from Moravia, wrote that "in Schubert's pianoforte music, perhaps even more than in his other compositions, we find a Slavic trait which he was the first to introduce prominently into art-music, namely the quaint alternation of major and minor within the same period."[73]

Upon studying Schubert's music in more depth later in his career (especially the mid- to late-1870s and early 1880s), Dvořák must have been strongly attracted to commonalities in their

---

[71] Antonín Dvořák, "Franz Schubert," in collaboration with Henry T. Finck, *Century Illustrated Monthly Magazine* 48, no. 3 (New York, 1894), 341–46. A reprint of the article can be found in Clapham, *Antonín Dvořák, Musician and Craftsman*, 296–305.

[72] Especially with regard to key area, Schubert's practice is presaged by the later works of Beethoven. Also, much of Schubert's instrumental music was unperformed (or underperformed) in Prague. See Smaczny, "The Schubertian Inheritance among Czech Composers," for a complete listing of which Schubert pieces (mostly *Lieder*) were performed in Prague, and also where and when they were performed. Even Schubert's monumental piano trios had only one or two public performances during the 1860s–70s.

[73] Clapham, 303. It is unclear whether Dvořák means the alternation of major and its relative minor, or the alternation of parallel major and minor modes.

treatment of musical material. Because Dvořák encountered Schubert as a relatively mature composer, Susan Wollenberg has suggested that we might consider Dvořák's appropriation of Schubert's style to be "celebratory, rather than…merely imitative."[74] Indeed, precisely due to his compositional maturity at the time he was studying Schubert's music, Dvořák actually may have intensified his use of Schubertian models; that is, he could have more quickly and clearly appreciated the harmonic and formal implications of Schubert's thematic ideas and then imported any Schubertian novelties that he found useful into his own work.

The primary influence of Schubert on Dvořák, then, was not in the realms of harmony as many previous commentators have suggested; it was in the realm of form and, more specifically, the ways in which melodic-harmonic content affected the treatment of form. As such, the discussion of this facet of Schubert's influence will be dealt with in chapter 4.

Dvořák, as we have seen in his article on Schubert quoted above, acknowledged Brahms's enthusiasm for Schubert, an acknowledgement which also may have led earlier commentators, like Abraham, to believe that Dvořák was influenced by Brahms early in his career. Indeed, it is impossible to say whether or not Dvořák knew Brahms's pieces in the 1870s through score-study; there is no direct musical evidence of Brahms's influence (such as identical key plans in a given movement). Apart from some felicitous formal similarities in music of the early to mid-1870s—for instance, Dvořák's Piano Concerto in G Minor, op. 33 (1876), and Brahms's Piano Concerto in D Minor, op. 15 (1858), which, according to Dvořák's first

---

[74] Susan Wollenberg, "Celebrating Dvořák: Affinities between Schubert and Dvořák," *The Musical Times* 132, no. 1783 (Autumn 1991), 434–37. Beveridge sees the pieces written during the *annus mirabilis* of 1875 as being influenced by Schubert, especially his Piano Trios in B♭ and E♭; see p. 219. Another viewpoint is offered by Kyas Vojtech, in "Smetana e Dvořák e il loro rapporto con Schubert," *Nuova rivista musicale italiana* 18, no. 1 (Spring 1984), 52–62, which concentrates mostly on Schubert's influence on Smetana, but also treats Dvořák's music to a lesser degree.

biographer, Otakar Šourek, Dvořák almost certainly did not know[75]—Dvořák's music shows little signs of Brahms's influence before about 1877. This was the momentous year that, through the intervention of Eduard Hanslick, Dvořák and Brahms first established personal contact and in which Brahms introduced his publisher, Simrock, to Dvořák's music. It was with this later date in mind that Burghauser, in discussing Dvořák's turn toward classicism in 1874, has stated, "it is quite incorrect to attribute this inclination to classical form, as unfortunately has usually been done, to the influence of Johannes Brahms, whose work at that time was little known in Prague (or in Vienna for that matter). Brahms's influence began to appear (and rather in the direction of purity of compositional technique) not until after the famous letter from Brahms to Dvořák of March 1878, responding to Dvořák's dedication of the *Quartet in D minor*."[76] Burghauser may be exaggerating somewhat, but Döge, too, says that Dvořák "…began taking Brahms as a model no earlier than 1877."[77]

Burghauser instead sees Dvořák's classicizing strain (circa 1874–5) as a result of his own self-critical examination of his work-to-date and, following a thesis of Hartmut Schick, a growing acquaintance to the works of Schubert (whose music Dvořák was just then starting study in earnest).[78] Beveridge, too, finds Schubert largely responsible for Dvořák's classicizing

---

[75] Šourek's claim, from *Život a dílo Antonína Dvořáka* 1, 3rd ed. (Prague 1954), 287, is cited in David Beveridge, "Dvořák and Brahms: A Chronicle, An Interpretation," in *Dvořák and His World*, ed. by Michael Beckerman (Princeton: Princeton University Press, 1993), 78. This article is an excellent précis of the relationship between Brahms and Dvořák and is the source from which I have drawn many of the following points in this section. Paul Stefan says that "Brahms's compositions were unknown in Prague until the early Seventies," in *Dvořák*, trans. by Y. W. Vance (New York: Greystone Press, 1941; reprint New York: Da Capo Press, 1971), 88.

[76] Burghauser, "Smetana's Influence on Dvořák's Creative Evolution," 49; italics are his. Beveridge, in contrast to Abraham and in communion with Burghauser, sees no real Brahmsian traits in this work despite the dedication; see Beveridge, *Romantic Ideas in a Classical Frame*, 250.

[77] See Döge, "Dvořák, Antonín (Leopold)," *New Grove Dictionary of Music and Musicians, 2nd ed.*, ed. Stanley Sadie and John Tyrrell, vol. 7 (New York: MacMillan, 2001), 786.

[78] See Schick, *Studien zu Dvořáks Streichquartetten* (Laaber: Laaber-Verlag, 1990).

efforts.[79] With respect to Schick and Beveridge, I believe that Dvořák's increasing importation of folk elements in his music, following the aesthetic of Smetana discussed above, was also partly responsible for this classicizing strain. After all, Czech folk music tends toward regular periodicity of phrase structure and is much less harmonically adventurous than Dvořák's Wagnerian-phase music.

The final, and most intriguing, facet of the question of Brahms's influence on Dvořák can be deduced from the two composers' exchange of letters both from March of 1878. Dvořák wrote to Brahms, letting him know that he had been asked by Simrock to write some Slavonic dances and saying that "…since, however, I did not know how to begin this properly, I have taken the trouble to procure your famous 'Hungarian Dances,' and I shall take the liberty of using these as an exemplary model for the arrangement of the corresponding 'Slavonic.'"[80] After this, Dvořák continued to receive scores of Brahms's music from Simrock until Brahms's death, so there can be no question of Dvořák's familiarity with Brahms's music after this point. An undated letter from Brahms seems to have been in the post at around the same time, and in it, he writes:

> And so even today I say only that the study of your pieces gives me the greatest joy, but that I would also give a lot to be able to discuss some individual points with you. You write somewhat hurriedly. When you add the many missing ♯ ♭ ♮, however, perhaps look also now and then rather closely at the notes themselves, the voice leading, etc.
>
> I hope you will forgive me; to express such wishes in these matters to a man like you is very presumptuous! For I also accept them very thankfully as they are, and the dedication of the quartet I would regard as an honor done to me.[81]

[79] Perhaps a bit hyperbolically, Beveridge claims that "the Schubertian element, in fact, is probably strong enough to have accounted entirely for Dvořák's steps toward classicism at this time." Beveridge, 231.
[80] Beveridge, "Dvořák and Brahms: A Chronicle, An Interpretation," 65.
[81] Ibid., 66.

When they finally met in person in Vienna in December 1878 and then immediately again in Prague in January 1879, we can imagine that Brahms was able to discuss aspects of compositional technique (his "wishes") with Dvořák. To wit, Dvořák wrote to Brahms later that year saying, "during your last stay in Prague you were so kind as to draw my attention to some things in my works, and I must only be very thankful to you for it, for now I have really seen the many bad notes and have substituted others for them."[82]

The interesting question raised by the quotation from Burghauser above, then, is: in what manner was Dvořák's compositional technique "purified" by his study of Brahms's music? I believe, following Dvořák's own inclinations, Brahms's music helped propel Dvořák toward a more succinct presentation of his musical ideas—a tightening of formal connections and certain voice-leading procedures. In Dvořák's article on Schubert, he stated that "the longer I live, the more I become convinced that composers, like authors, mostly follow the impulse of writing too much."[83] As in the case of Schubert, Brahms's influence is most keenly felt by Dvořák in the formal arena and I will defer an in-depth discussion of this influence, as well as a tightening-up of the timeline regarding the onset of these influences, to chapter 4.

Formal issues notwithstanding, Dvořák's use of harmony in his mature work (after about 1880) is sometimes reminiscent of Schubert and, less often, of Brahms. A case in point is Dvořák's String Quartet in C Major, op. 61 (1881), whose beginning is often compared to Schubert's String Quintet in C Major, D. 956 (1828); see Example 1–16. The "magic" chord of the third measure (marked by an asterisk) not only lends a particular aural signature to the main subject, but introduces a set of tonal/motivic problems that Dvořák will work out for the rest of the movement: the non-tonic notes of A and E♭ foreshadow the importance these notes will take

[82] Ibid., 69–70. Also on these pages is a list of further personal meetings between the two composers.
[83] Clapham , 297.

on as the roots of salient key areas, the falling arpeggio through the C-minor triad sets up a modal conflict between C major and its parallel minor (a dyadic conflict between E and E♭), and the initial dotted rhythm's diminution in the second measure forecasts certain rhythmic treatments of the theme. Even in this brief example, one can see the intertwining of musical content and its implications for the unfolding of the work's form. A fuller discussion of this work can be found in chapter 5, pp. 284–301.

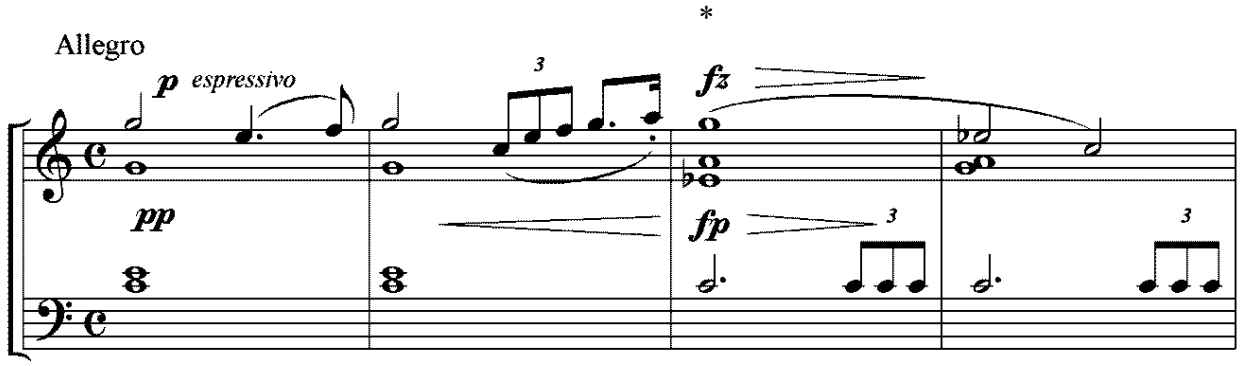
Later, in the finale of the work, I hear an affinity between this piece and Brahms's String Sextet in G Major, op. 36 (1865).[84] In Dvořák's work, the arpeggiation of a local ♭VI^6 in mm. 117–23, which can also be seen as a modal 5–6 shift over a stationary bass, is reminiscent of a similar treatment in the opening of Brahms's sextet; see Example 1–17.[85] In both cases, the emphasis on ♭VI is reminiscent of Schubert—in which case, we might hear this affinity between Dvořák and Brahms as a musical response of the former to the Schubertian elements in the music of the latter. I will discuss the shared Schubertian inheritance of both composers in more detail in chapter 4, especially the way in which Brahms may have communicated certain formal details of Schubert's practice to Dvořák.

[84]Cf. Schick, 258, and Döge, *Antonín Dvořák*, 175–76, who hear this as well.

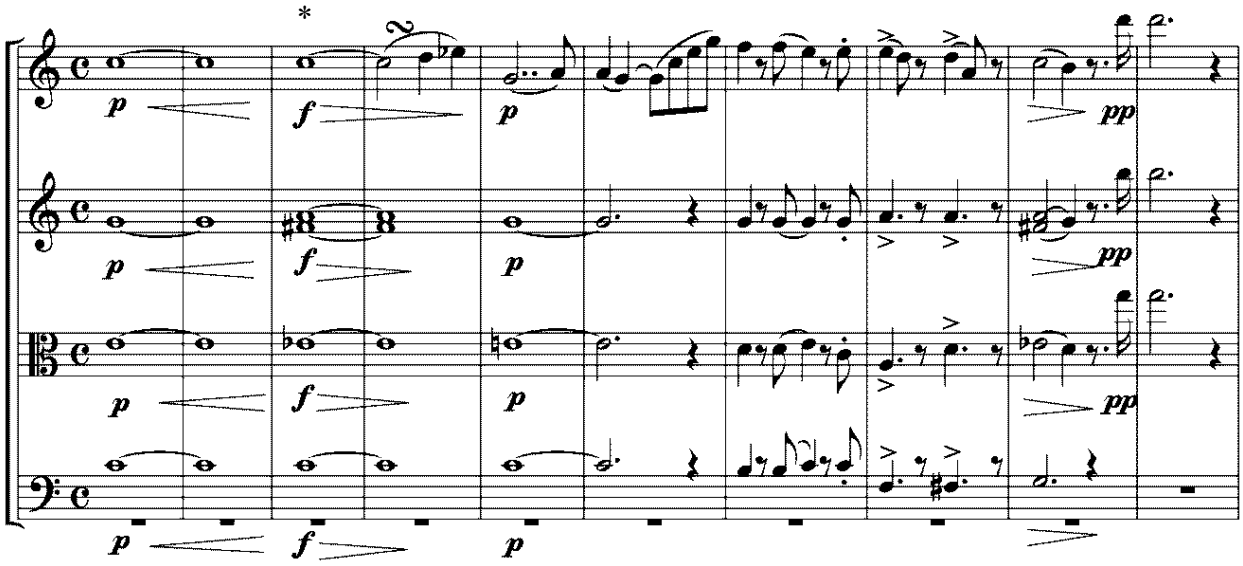
[85] The difference is that Dvořák returns to the root position I chord before moving to the dominant, whereas Brahms coordinates the return to a "G major" sonority with the onset of a cadential six-four. Interestingly, Beveridge sees Brahms's second movement Scherzo as a polka in all but name, and suggests it may have influenced Dvořák's inclusion of a polka in his String Quartet in D Minor, op. 34 (1877), especially since the trio of each is in a triple meter. Burghauser points out a more proximate influence for Dvořák, however, namely Fibich's own String Quartet in A Major (1874) with a polka-scherzo.

Example 1–16.

a. Dvořák, String Quartet in C Major, op. 61, first four measures. Common-tone half-diminished seventh chord marked by an asterisk.

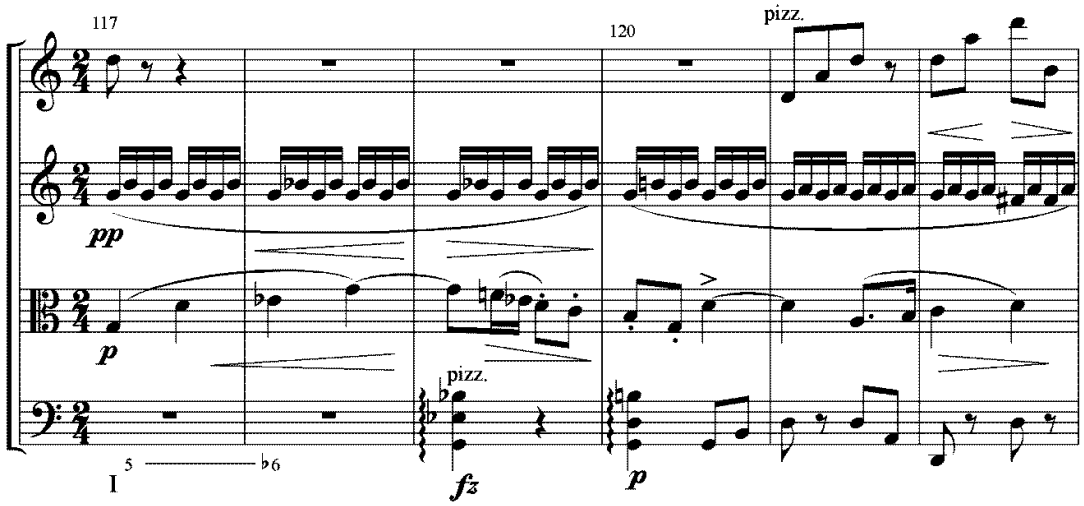


b. Schubert, String Quintet in C Major, D. 956, first ten measures. Common-tone fully diminished seventh chord marked by an asterisk.

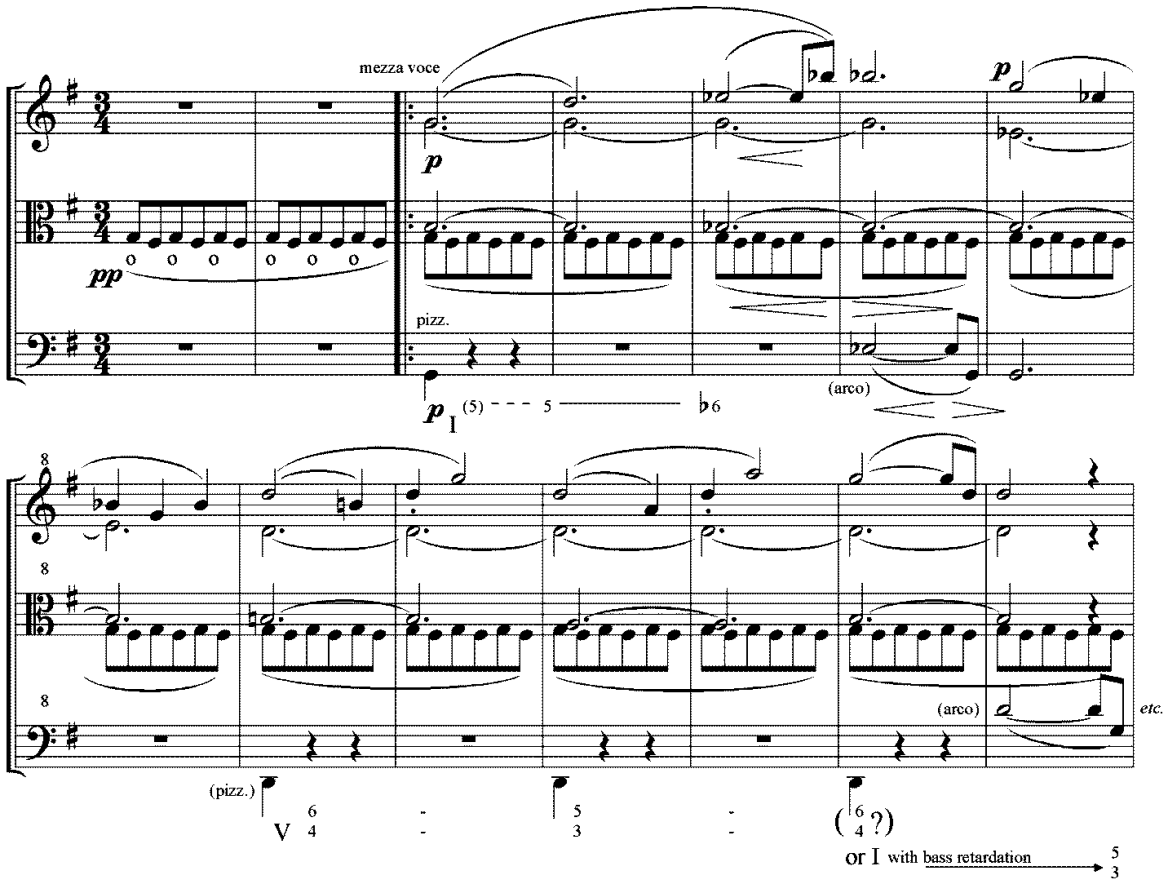


Example 1–17.

a. Dvořák, String Quartet in C Major, op. 61, Finale, mm. 117–22. Chromatic 5–6 shift over a real or imagined stationary bass.



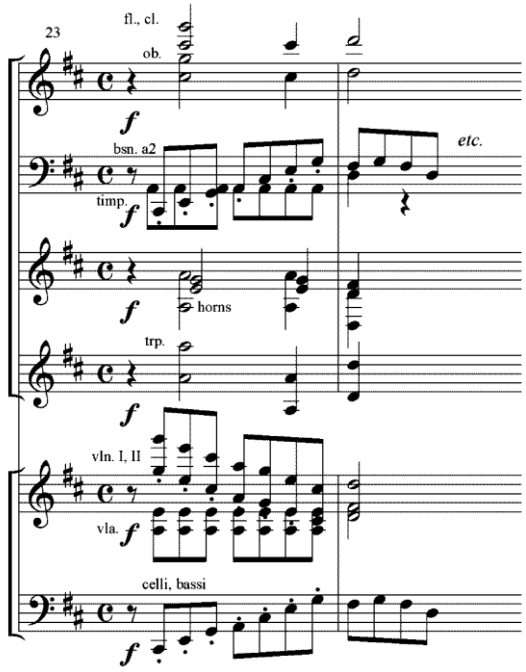
b. Brahms, String Sextet in G Major, op. 36, i, opening, mm. 1–14. Chromatic 5–6 shift over a real or imagined stationary bass.



This use of local color can also be observed in Dvořák's Symphony no. 6 in D Major, op. 60 (1880), widely seen as inspired by Brahms's Second Symphony in the same key (1877, published in 1878).[86] As Clapham has noted, the first movement exposition in both works touches on E minor in the tenth measure; as a point of difference, one should note Dvořák's choice of B major (VI) for the first movement's second subject (as opposed to Brahms's choice of iii).[87] Clapham and many others have pointed out the similarities that the openings of the Finales possess: *pianissimo* dynamic, scurrying string texture, and motivic reminiscence of the first movement.

Example 1–18. A comparison of significant V^7 chords between Brahms's Second Symphony and Dvořák's Sixth.

a. Brahms, Second Symphony, finale, mm. 23–4. All parts here written in C.

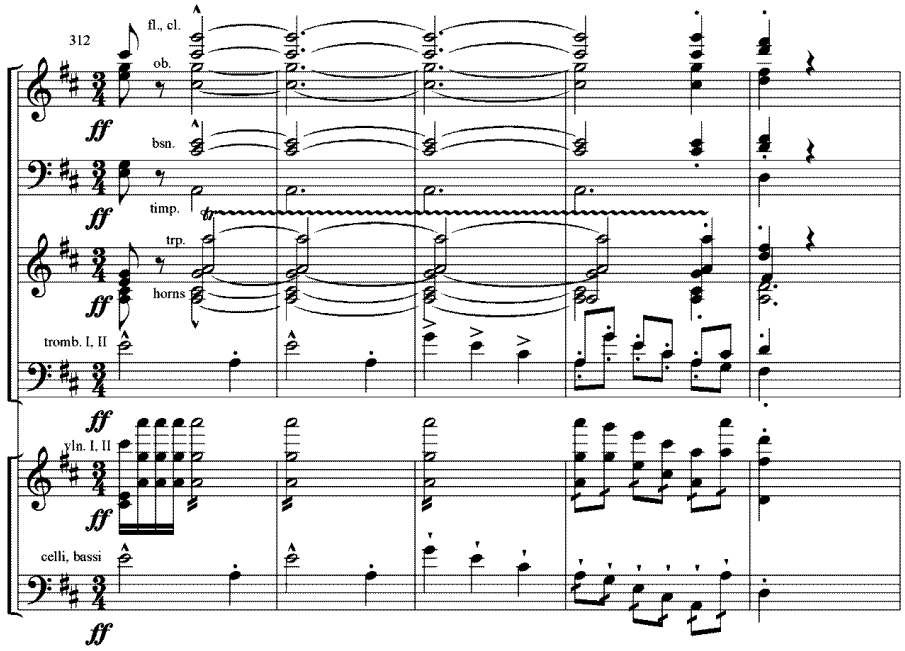


[86] See, for example, Beveridge, 268–79; Julian Harrison, "Dvořák's Orchestra and His Symphonic Expression," in *Antonín Dvořák: His Achievement*, ed. by Viktor Fischl (London: Drummond, 1943; reprint, Westport, CT: Greenwood Press, 1970), 272–82; and Robert Layton, *Dvořák Symphonies and Concertos* (Seattle: University of Washington Press, 1978, 30–36.

[87] Clapham, 71–76.

Example 1–18. continued**.**

b. Dvořák, Sixth Symphony, first movement, mm. 312–16. All parts in C.



One feature of both works, that seems not to be mentioned in the literature, concerns the use of a salient V^7 whose orchestration and metric placement give it a certain characteristic sound and meaning (and therefore, intertextual import). In the case of Brahms, the chord comes on the second beat of m. 23 in the *alla breve* Finale, introducing the *fortissimo* statement of the opening theme (see Example 1–18a); a very similar chord is found at the end of the movement (mm. 413–16) to articulate the final V^7 of the piece. Dvořák uses almost exactly the same sonority to usher in not only the *fortissimo* statement of the Finale's opening theme (mm. 37–39), after the manner of Brahms, but also the climax of the retransition to the recapitulation in the first movement (mm. 312–15; see Example 1–18b).

Beyond the syncopation of the two examples, of particular significance is the exact same scoring for upper winds, and very similar scoring for the trumpets and horns (notice the brassy whole-tone clash). Although Dvořák chose to have upper strings sustain a *tremolando* (unlike Brahms) and his moving low voices are in the trombones rather than Brahms's bassoons, the close similarity of effect in the two passages is quite striking. Given that Dvořák was an acknowledged master of orchestration, particularly with respect to his wind writing (see, for example, the opening of the 1873 Romance in F Minor for violin and orchestra, op. 11), and with all the other resemblances between the two pieces, this is probably a conscious, and successful, attempt to mimic the sound-world of Brahms's Second Symphony.

Despite the similarities with Brahms's Second Symphony, Dvořák's Sixth is widely considered an original work and his first masterpiece in the genre (the strengths of his Fifth Symphony notwithstanding). When analyzing his relationship with Brahms, we would do well to remember Wollenberg's idea that Dvořák's appropriation of Schubertian elements was celebratory rather than derivative. Given that the two symphonies of Brahms and Dvořák are so close in date of composition, we might well imagine Dvořák's essay as a celebratory homage to Brahms, an homage that Brahms may have returned a few years later if we are swayed by Beveridge's intriguing reading of Brahms's Third Symphony (1883) as a response to Dvořák's Fifth (1875).[88]

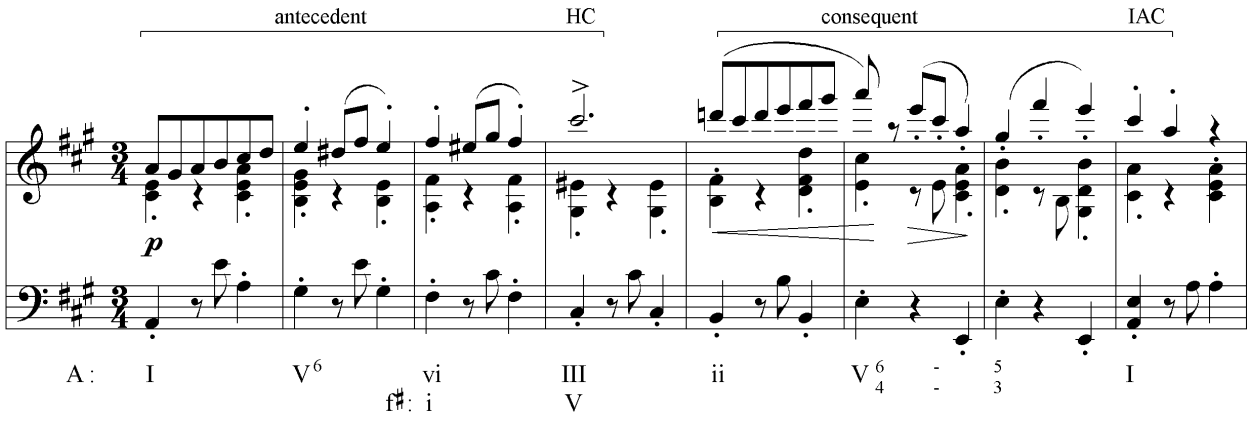
A final example, somewhere in the interstices between harmony and form, is the Scherzo of Dvořák's Piano Quintet in A Major, op. 81 (1887), in which he appropriates the texture and tonal trajectory of the *Allegro vivace* section (essentially a Scherzo analog) from Schubert's

[88] See Beveridge, "Echoes of Dvořák in the Third Symphony of Brahms," *Musik des Ostens* 12 (1989), 221–30.

Fantasy in F Minor for two pianos, D. 940 (1828); see Example 1–19.[89] In both cases, the initial phrase elaborates a descending 5–6 motion from the tonic to a firmly articulated major mediant before moving on to the pre-dominant and cadential six-four harmonies. Dvořák follows Schubert's harmonic/outer-voice schema exactly for the first four measures (Example 1–18c), but because his Scherzo starts in major, there is a heightened tonal contrast between the major tonic and the major mediant.

Example 1–19.

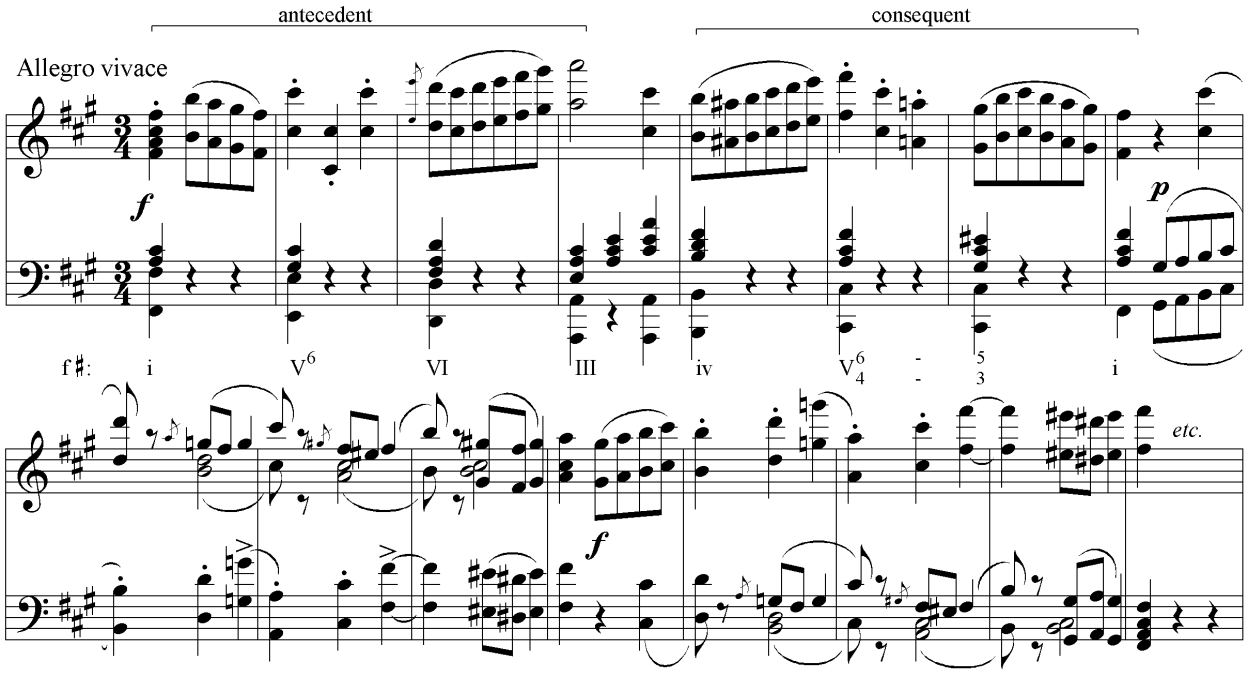
a. Dvořák, Piano Quintet in A major, op. 81, iii, first 8 mm. Antecedent ends on a chromatically inflected major mediant.



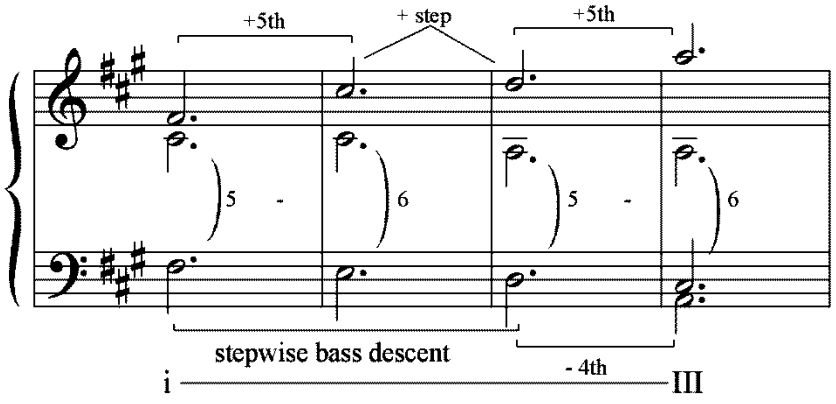
[89] Wollenberg also noticed this connection, but she did not explicitly identify the identical outer-voice structure of the two passages, which demonstrates more than a superficial resemblance.

Example 1–19. continued.

b. Schubert, Fantasy in F Minor, D. 940, *Allegro vivace*, first 16 mm. Antecedent ends on the diatonic mediant.



c. Schema for the initial four measures.



Conclusion.

By following the reasoning articulated by Brillat-Savarin's quotation at the beginning of the chapter, I hope to have shown that Dvořák's output was shaped by the consumption of some composers' work more than that of others, in part because of biographical circumstance. Interactions with the persons and music of Wagner, Smetana, and Brahms during important stages of Dvořák's life seem to have produced appreciable effects in his overall compositional development. Strong stylistic similarities between the young Dvořák's music and that of Schubert seem to have prompted Dvořák to embrace the latter as a model for some of his more mature works. This is in contrast with other Romantic composers such as Liszt, Raff, Schumann, Berlioz, and Mendelssohn, whom Dvořák certainly knew and from whom he took some inspiration, but who seem to have impacted his compositional trajectory in a considerably less far-reaching manner.

Although understanding some of the musical influences in Dvořák's life is an important facet of an overall understanding of his output, his genius is not found in the sum of such influences; indeed, it immensely exceeds them. It remains to be seen in the following chapters how Dvořák participated in, and helped shape, the continuing development of nineteenth-century tonality, the extension of formal procedures, and the communication of musical meaning.

CHAPTER 2: TRENDS IN NINETEENTH-CENTURY HARMONY.

The nineteenth century was insatiable in its drive to complexity,
in its lust for fresh compounds of thirds, nonharmonic tones, and chromaticizations.

—Carl Dahlhaus[1]

Like the young Mozart, Dvořák readily absorbed various musical dialects and, after a period of experimentation, combined them with his already considerable talents. We have already seen how he was able to ultimately absorb and incorporate a Wagnerian ideal of "lustful" harmony as he developed what became, in other respects, a more or less Classically oriented compositional style.[2] In addition to the specific influences described above, Dvořák was a product of the Romantic era in general; even in his earliest music he speaks to us in the parlance of his time, a nineteenth-century tonal practice expanded and enriched from a Classical base of tonal grammar and syntax. The purpose of the next section is to examine Dvořák's participation in the development of this nineteenth-century tonal practice.

Contemporary critics often cited Dvořák for his imaginative use of harmony, often to his credit, but sometimes not. Among the Dvořák enthusiasts, the English critic Joseph Bennett, writing in 1884, called attention to Dvořák's "…almost excessive freedom in the employment of modulations and transitions without reference to key relationship….Yet, somehow, this feature appears to harmonize with the general character of the music, and does not become offensive

[1] Carl Dahlhaus, *Nineteenth Century Music*, trans. by J. Bradford Robinson (Berkeley: University of California Press, 1989), 376.
[2] One of the main theses of Beveridge's *Romantic Ideas in a Classical Frame* is the description of the evolution of Dvořák's musical content in the sonata forms from the chromatically rambling and diffuse forms of youth to the masterly combination of romantic content and classical proportion of Dvořák's maturity.

even where most pronounced."[3] In contrast, Joseph Horowitz cites some negative reviews in the United States, "especially [of] the performance of the Requiem, which different critics found to possess "barbaric modulations" and "barbaric musical means."[4]

In the following chapter, I will explore three broad categories of nineteenth-century harmonic practice with a special focus on their intersections with Dvořák's music, with occasional references to the writings of contemporary critics, but more commonly to the latter-day theories that are germane to such discussions. The three broad categories can be classified as follows:

1) **Enriched chromatic function**, which encompasses: the use of juxtaposed third-related harmonies (and their hexatonic or octatonic implications); voice leading between different types of seventh chords and other "tall chords" of extended thirds; harmonically ambiguous chords that engage the concept of *Mehrdeutigkeit*; and chromatic sonorities through voice leading.

2) **Enriched diatonic function**, which encompasses: modal, or quasi-modal, practices, such as the emphasis of secondary triads in a key (e.g., iii and vi); pentatonicism; and non-standard diatonic sonorities through voice leading.

3) **Enriched cadential function**, which may be either chromatic or diatonic, with a special emphasis on leading-tone substitutions by the submediant and subtonic scale degrees, and the concomitant use of subdominant or minor-dominant harmonies in support of such substitutions.

---

[3] Joseph Bennett, "Anton Dvořák," *Musical Times* 25, no. 494 (Spring 1884), 189–92. In the same article he stated that "now that Wagner is dead, no more interesting figure than Dvořák remains for the contemplation of music-lovers." See also Bennett's earlier favorable article, "The Music of Anton Dvořák," *Musical Times* 22, no. 458 (Spring 1881), esp. 165–69.

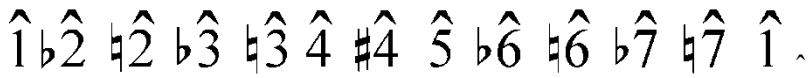
[4] From Joseph Horowitz's summary of Dvořák's reception in Boston in *Classical Music in America* (New York: W. W. Norton, 2005), 68.

I. Enriched Chromatic Function

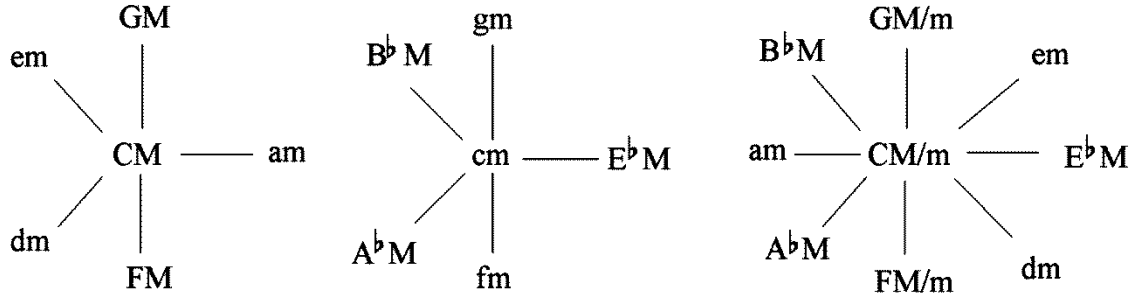
One of the great strands of harmonic development in the nineteenth century was the gradual enrichment of chromaticism beyond that of the Classical era. Largely aided by the widespread adoption of equal temperament, and the fusion of a single tonic's parallel modes into a single hybridized chromatic-diatonic scale (what I call a *dual-mode tonic*, see Example 2–1) with its concomitant increase of closely related keys, nineteenth-century pieces tended to emphasize key areas and local juxtapositions of chords only rarely found in the music of the Viennese Classicists and their contemporaries.

Example 2–1.

a. The hybridized chromatic-diatonic scale.



b. Closely related keys for a single-mode vs. dual-mode tonic.



i.) 5 close keys ii.) 5 close keys iii.) 10 close keys

This is not to say that a fully chromatic scale usurped the role of a diatonic one at this time, though various theorists did try to bring all twelve chromatic notes into a direct relation with a single tonic. As Daniel Harrison has carefully explained (from a dualistic standpoint), "major-minor permeation results, not in an integrated chromatic tonality, but in a major-minor tonality in which the two modes remain perceptually separable while compositionally squeezed together in unprecedented density. And, as long as they do mix like oil and water, traditional tonality will still be heard and understood."[5] Heinrich Schenker was one of the first theorists to present an analytical understanding, and orthographic representation, of the dual-mode tonic with his designation of a key area as "$\frac{\text{major}}{\text{minor}}$."[6] Though not identifying the dual-mode tonic as such, some late nineteenth-century theorists attempted to include $\flat\hat{2}$ and $\sharp\hat{4}$, the only chromatic pitches not available via modal mixture, as directly relatable to a tonic; they invented various means to show such derivations. For example, Harrison has shown that Cyrill Kistler (1848–1907), grounded in Moritz Hauptmann's theories, created a novel "stretched" form of the minor scale, in which the system is extended by major third from either end of the scale derivation, as can be seen in Example 2–2.[7]

Aside from the implications for large-scale form of this highly chromaticized diatonic scale, nineteenth-century composers often manifested an interest at the local level for the effects that this increased chromatic palette allowed them. This yielded, in part, progressions of chords

---

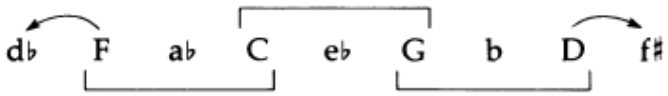
[5] See Daniel Harrison, *Harmonic Function in Chromatic Music: a Renewed Dualist Theory and an Account of its Precedents* (Chicago: University of Chicago Press, 1994), 19–20.

[6] Schenker admits $\flat\hat{2}$ to the expanded chromatic scale as the Phrygian scale step—see §160 of *Harmonielehre* (1906)—and, thus, $\sharp\hat{4}$ is really the only pitch without a direct relation back to the tonic via modal mixture.

[7] See Harrison, "Supplement to the Theory of Augmented-Sixth Chords," *Music Theory Spectrum* 17, no. 2 (Autumn, 1995), 170–95. Kistler's originally created stretched minor to help derive augmented sixth chords, especially the tonic-resolving augmented sixth built above $\flat\hat{2}$, but this derivation helps reify both $\flat\hat{2}$ and $\sharp\hat{4}$ as quasi-diatonic in the major-minor scale.

by thirds, locally ambiguous sonorities, and dissonant chords whose function (meaning) is derived by voice-leading.

Example 2–2. After Cyrill Kistler's adaptation of the harmonic theories of Mortiz Hauptmann. The two augmented sixths are D♭–B, and A♭–F♯.



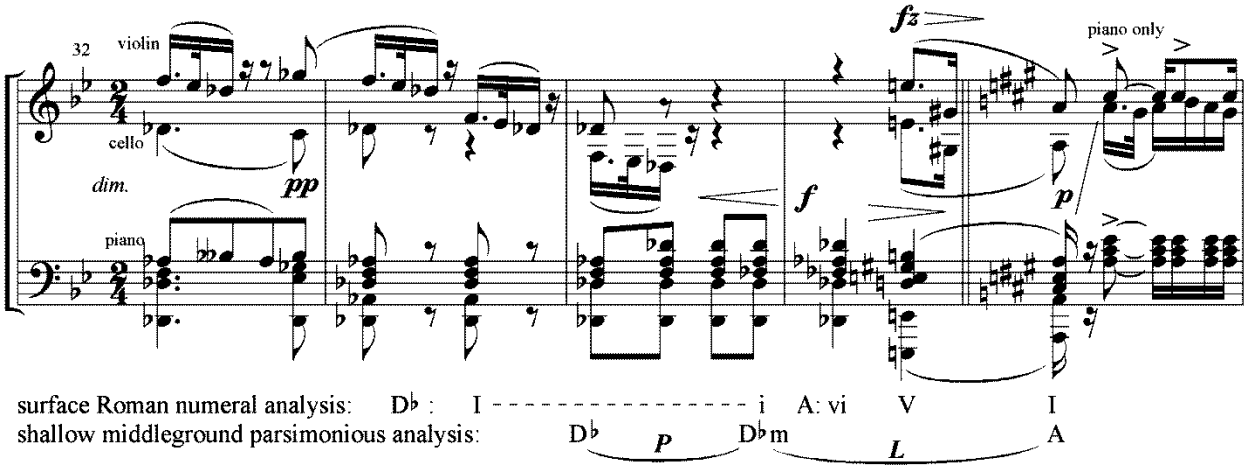
Root progressions by third.

As Leonard Ratner has pointed out, third-relations color the nineteenth-century musical surface in a way that the fifth-related and stepwise harmonic motions of the Classical era do not; to use the terminology popularized by Robert Hatten, third relations are marked during the Classical era.[8] Although they lost their markedness as the nineteenth-century progressed, to the extent that composers such as Brahms and Dvořák invoked an earlier dialectic by writing in sonata (or other traditional) forms, third-relations could retain a sense of this markedness. By way of example, Joseph Bennett calls especial attention to Dvořák's transition from D♭ minor to A major in the second movement of the Piano Trio in B♭ Major, op. 21 (1875, shown in Example 2–3); writing in 1881 and fully aware of Wagner's exploitation of chromaticism in the prior decades, Bennett was sensitive to the implications of classicism inherent in Dvořák's use of sonata form, and, as such, able to appreciate the marked nature of such a transition.[9]

[8] See Leonard Ratner, *Romantic Music: Sound and Syntax* (New York: Schirmer Books, 1992), esp. 113–15; and Robert Hatten, *Musical Meaning in Beethoven*.

[9] Bennett, "The Music of Anton Dvořák." I think it is highly probable that Bennett was rather more taken with the juxtaposed *keys* of D♭ major-minor and A major rather than the actual boundary chords, especially as the transition

Example 2–3. Piano Trio in B♭ Major, op. 21, i, mm. 32–36. Juxtaposition of two major keys that are a major third apart.



Chord progressions by chromatic mediant, such as those found in Dvořák's op. 21 piano trio, exploit parsimonious aspects of voice-leading that are not characteristic of fifth- and step-related harmonies. For example, expanding the outer notes of a root-position major triad by one semitone smoothly leads to another major triad related by major third. That a tonic-dominant polarity is unnecessary for understanding such direct progressions is espoused by many theorists, including the practitioners of neo-Reimannian theory on one hand, whose ***P***, ***L*** and ***R*** transformations describe various chord progressions (often visually represented on the *Tonnetz*), and on the other hand by David Kopp, who created a nomenclature and notational system for describing various progressions in what he terms the common-tone tonality of the later nineteenth century.[10]

---

is mediated by a dominant-seventh chord of A major—in this case, the most superficial level does not contain parsimonious relationships, but simply reinterprets the D♭-minor chord as vi of A in a conventional vi–V^7–I cadence. Since the mediating dominant-seventh happens so quickly, though, it is easy to hear the keys as being in close communion and thus relatable by parsimonious voice leading at a shallow middleground level.

[10] Here, I take as an inspiration the systematic nomenclature for parsimonious voice-leading that has been developed by David Lewin, Brian Hyer, and Richard Cohn, among other neo-Riemannians. Representative articles are David Lewin, "Transformational Techniques in Atonal and Other Music Theories," *Perspectives of New Music* 21, nos. 1–

The ubiquity of chromatic third-relations in the nineteenth-century repertoire, assisted in part by the nature of the dual-mode tonic, lead to a chromatically saturated pitch-space; often, a tonic underpinning is still present, but diatonic-prolongational processes predicated upon Classical practice are attenuated. As Matthew Bribitzer-Stull has shown, chromatic mediants began historically as subordinate harmonies to the diatonic pillars of the tonic and dominant *Stufen*, but as the century progressed, these third-relations began to assume a more direct structural role, to the point where, as in many Debussy pieces for instance (as shown by Avo Somer), there is little or no reference to tonic-dominant opposition.[11] In the case of more conservative nineteenth-century composers, such as Brahms and Dvořák, chromatic mediants are most often subordinate to large-scale diatonic structures. Occasionally, we may find passages whose musical processes are convincingly explained at the local level by means that supplement or transcend traditional analytic approaches for diatonic music, such as Gregory Proctor's transposition operation or the various neo-Riemannian operations.[12]

Dvořák's Piano Quartet in E♭, op. 87 (1889) is replete with local-level parsimonious relationships. Refer to Example 2–4 for the following discussion. In the first measure Dvořák introduces a dyadic conflict between the diatonic B♭ and the chromatic B♮ (C♭). This conflict is

---

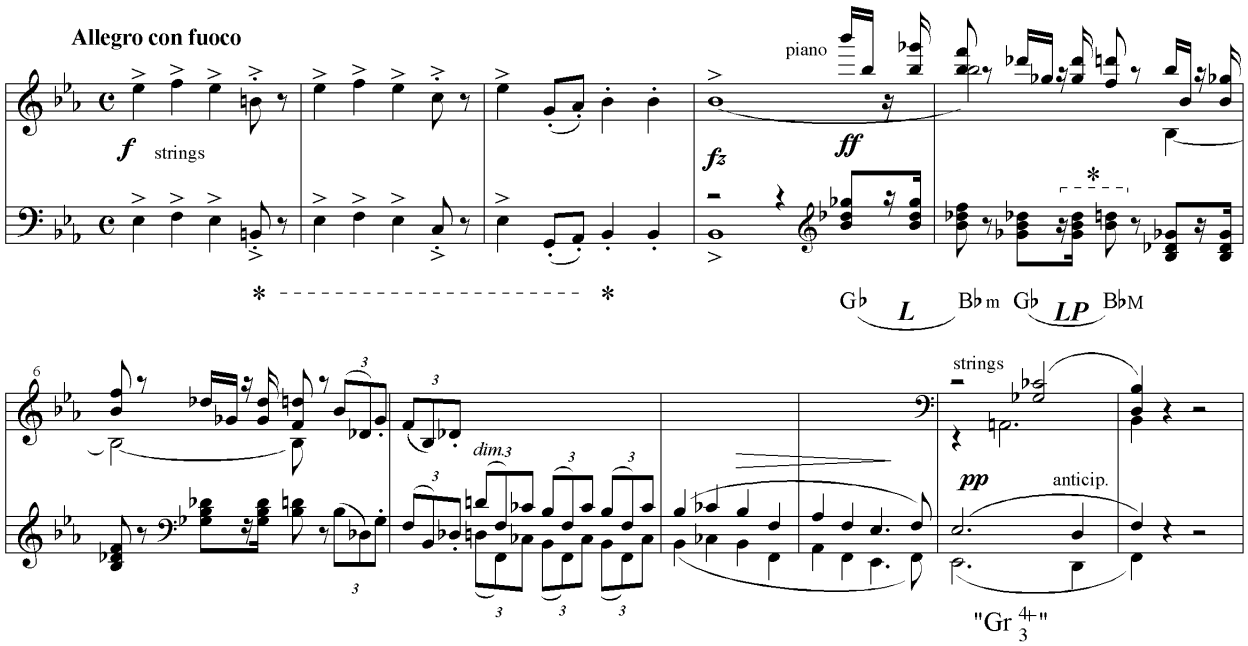
2 (Summer 1983), 312–71 and "Amfortas's Prayer to Titurel and the Role of D in Parsifal: The Tonal Spaces of the Drama and the Enharmonic C♭/B," *19th-Century Music* 7, no. 3 (Spring 1984), 336–49; Brain Hyer, "Reimag(in)ing Riemann," *Journal of Music Theory* 39, no. 1 (Spring 1995), 101–138; Richard Cohn, "Maximally Smooth Cycles, Hexatonic Systems, and the Analysis of Late-Romantic Triadic Progressions," *Music Analysis* 15, no. 1 (Spring 1996), 9–40; Cohn and other authors such as Jack Douthett are represented in an issue of *Journal of Music Theory* (vol. 42, no. 2), which is devoted entirely to explorations of neo-Riemannian theory. See also David Kopp, *Chromatic Transformations in Nineteenth-Century Music*, (New York: Cambridge University Press, 2002); especially useful are his designations of the various mediants around a given tonic such as Lower Flat Mediant (LFM), Upper Sharp Mediant (USM), etc.

[11] See Matthew Bribitzer-Stull, "The A♭–C–E complex: The Origin and Function of Chromatic Major Third Collections in Nineteenth-Century Music," *Music Theory Spectrum* 28, no. 2 (Autumn 2006), 167–190; and also Avo Somer, "Chromatic Third-Relations and Tonal Structure in the Songs of Debussy," *Music Theory Spectrum* 17, no. 2 (Autumn 1995), 215–241.

[12] For a detailed explanation of the transposition operation, see Gregory Proctor, *Technical Bases of Nineteenth-Century Chromatic Tonality: A Study in Chromaticism* (Ph.D. diss., Princeton University, 1978).

echoed in the chromatic G♭-major chords that decorate the dominant, where a dyadic conflict between D♭ and D♮ occurs; depending on whether the dominant is minor or major, the relationship is either ***L*** or ***LP***. These symbols allow us to succinctly represent the harmonic character of the progression, which does not sound Classically tonal yet makes perfect sense in its own right. Finally, though it is not a triad, the pre-dominant chord (a diminished-third "German $\frac{4}{3}$") in m. 11 is enharmonically equivalent to a C♭ dominant seventh and leads to the dominant by semitone (parsimoniously) in all voices at a slightly deeper level than the surface; the bass leap is motivic (reminiscent of Wagner's Fate leitmotiv from the *Niebelungen* operas).

Example 2–4. Piano Quartet in E♭ Major, i, mm. 1–10. Dyadic conflicts between B♭ and B♮ and between D♭ and D♮ (shown by asterisks).



The chord progressions shown in Example 2–4 are a subset of a larger complex of chords related by the ***PLR*** operators, described by Richard Cohn as hextatonic systems, and provide another way of thinking about some kinds of nineteenth-century harmonic progressions that are not relatable to those of traditional Classical practice.[13] Hexatonic relationships are implied at the beginning of Dvořák's op. 87 piano quartet through the use of the ***L*** and ***LP*** relations; they are not an opening gambit meant to grab the listener's attention through superficial coloration during the initial exposition of motives. Rather, deep middleground implications are realized later in the piece: the expositional S-zone is in the key of G major (III♮) and recapitulates initially in B major (respelled ♭VI), both keys around Cohn's Western system.[14] At first blush, this may appear to delineate a form in which the opening tonic is symmetrically framed by chromaticized upper and lower mediants, yielding an augmented triad as the generator of the structure. In terms of large-scale tonal organization, however, the chromatic mediants in Dvořák's Piano Quartet, despite their ubiquity and importance for the morphology of the piece, do not supplant an underlying tonic-dominant framework at the deepest level of structure. Mark Anson-Cartwright clearly speaks to this point when he writes that even in highly chromatic tonal music only the tonic and domainant triads can generate the *Ursatz* (although he admits motivic parallelisms of dissonant chords at deep middleground levels).[15] A more detailed reading of certain aspects of this piece will be found in the next chapter on form.

---

[13] Richard Cohn, "Maximally Smooth Cycles, Hexatonic Systems, and the Analysis of Late-Romantic Triadic Progressions."

[14] I will often use the terminology outlined in James Hepokoski and Warren Darcy's *Elements of Sonata Theory* (New York: Oxford University Press, 2006) for the various areas or zones of sonata-form movements.

[15] Indeed, in "Chord as Motive: the Augmented-Triad Matrix in Wagner's 'Siegfried Idyll,'" *Music Analysis* 15, no. 1 (Spring 1996), 57–71, Anson-Cartwright suggests that the augmented triad is transferred across different levels of surface and middleground structure without penetrating to the furthest background I–V–I progression. Music organized around some sort of dissonant-chord "prolongation" would then, by this definition, cease to be tonal. Even attempting to use the term prolongation with respect to atonal music is problematic; see Straus, "The Problem

Dvořák's mature harmonic practice often embraces voice-leading transformations between and among seventh chords almost as much as triads. In the next few paragraphs we will explore the various ways different theorists have explored the relationships and transformations between seventh chords. My express intent is to show links between certain neo-Riemannian transformations (including Richard Bass's writings on half-diminished seventh chords) and what Victor Yellin has termed the "omnibus" progression. As Dvořák was fond of both full and partial employment of the omnibus, the ability to recognize and understand his use of the device, especially as it applies to his formulation of musical structures, is of utmost analytical importance.

Because the ***PLR*** operators of neo-Riemannian theory are themselves triadic transformations, analytical emphasis tends to fall on the relationships between and among triads. When concatenated into cycles, however, combinations of these operators can generate supersets that contain non-triadic entities, some of which are familiar as the seventh chords of functional tonality and some of which are not (such as tone clusters). Dividing the octave equally by major thirds completes a hexatonic ***PL*** cycle, yielding what Mark Anson-Cartwright calls an "augmented triad matrix."[16] The constituents of these ***PL*** hexatonic cycles (for example, [03478E]) can generate major, minor, and augmented triads, but the only seventh-chord collections that can be derived are the major-major seventh chord (for example, [047E]), and the even less-common minor-major seventh chord, [037E]. In contrast, the constituents of the ***PR*** cycle (for example, [0134679T]) form not just triads (major, minor, and diminished) but also the

---

of Prolongation in Post-Tonal music," *Journal of Music Theory* 31, no. 1 (Spring 1987), 1–21 and also, in this vein, his "Response to Larson," *Journal of Music Theory* 41, no. 1 (Spring 1997), 137–39.

[16] Anson-Cartwright, 58. For a thorough analysis of the augmented triad in the theory and practice of the mid- to late nineteenth century, see R. Larry Todd's chapter "Franz Liszt, Carl Friedrich Weitzmann, and the Augmented Triad" in *The Second Practice of Nineteenth-Century Tonality*, edited by William Kinderman and Harald Krebs, (Lincoln: University of Nebraska Press, 1996), 153–175. According to Todd, from 1853 to 1854, Weitzmann wrote three treatises on the augmented triad, the history of the seventh chord, and the diminished-seventh chord.

most familiar seventh chords of the Classical and Romantic eras: the dominant, minor-minor, half-diminished, and fully diminished seventh chords. In this way, we can conceive of root progressions by minor third, even between triads, as an evocation of a pitch-space based on seventh chords. As we will see, this kind of conception can sometimes explain certain progressions in Dvořák's music. As analogous to Anson-Cartwright's "augmented triad matrix," perhaps we could call the equal division of the octave by minor thirds, completing the octatonic ***PR*** cycle, a "diminished-seventh-chord matrix."[17] Although such a construct by no means accounts for all the different types of relationships between and among seventh chords, it is a good starting point; dominant- and half-diminished seventh chords are only one semitone removed from such a matrix, respectively.[18]

An awareness of the ability for the diminished seventh-chord matrix to structure relatively large swaths of music emerged as early as the last quarter of the eighteenth century. Robert Wason has discussed Abbe Georg Vogler's incipient treatment of what Victor Yellin has dubbed the "omnibus" progression; Vogler was evidently the first to publish a rule of the octave for the chromatic scale (in addition to the customary major and minor scales), which contains elements of the omnibus.[19] Both Paula Telesco and Robert Gauldin have shown numerous passages from the mid-1700s onwards that traverse small and large portions of what Telesco terms the "omnibus cycle" (Wason calls it the "extended omnibus"), shown below as Example

[17] Incidentally, jazz musicians sometimes refer to the octatonic scale as the "diminished scale."
[18] For a discussion of the parsimonious relations between dominant- and diminished-seventh chords, see Jack Douthett and Peter Steinbach's "Parsimonious Graphs: A Study in Parsimony, Contextual Transformations, and Modes of Limited Transposition," *Journal of Music Theory* 42, no. 2 (Autumn 1998), 241–263. See also Yosef Goldenberg, "'Negative Texture' and the Prolongation of Seventh Chords," *Theory and Practice* 29 (2004), 95–123.
[19] For a more thoroughgoing discussion of the omnibus progression, including the subtle differences between Yellin's concept and Vogler's realization, see Victor Yellin, *The Omnibus Idea* (Detroit: Harmonic Park Press, 1998); Robert W. Wason *Viennese Harmonic Theory: From Albrechtsberger to Schenker and Schoenberg* (Ann Arbor, Mich.: UMI Research Press, 1984); and Paula Telesco "Enharmonicism and the Omnibus Progression in Classical-Era Music," *Music Theory Spectrum* 20, no. 2 (Autumn 1998), 242–279. See also Robert Gauldin, "The Theory and Practice of Chromatic Wedge Progressions in Romantic Music," *Music Theory Spectrum* 26, no. 1 (Spring 2004), 1–22.

2–5.[20] Telesco also shows how Vogler often substituted a fully-diminished seventh chord in place of one the dominant sevenths without disturbing the meaning/function of the progression. As many of these commentators have observed, a full traversal of the omnibus manifests a diminished-seventh chord in two main ways: 1) as an aggregate of the common tones necessary in each of the four overlapped segments, hence Telesco's identification of Example 2–5a as a b^{o7} cycle; and, 2) as an arpeggiation of the root of the initial chord of each segment—Wason prefers to call it a composing-out of a diminished-seventh chord (in Example 2–5a, the roots form an E–G–B♭–D♭ chord). Generally speaking, these two manifestations are outgrowths of the implications for continuation contained in the first two chords in any segment (two dominant-seventh chords whose roots are a minor third apart) and the common tones between them.

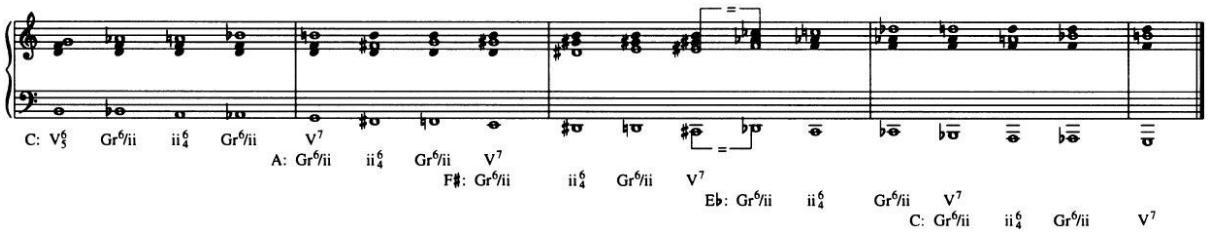
[20] Example 2–5 is a reproduction of Paula Telesco's Examples 18 and 19 in "Enharmonicism and the Omnibus Progression in Classical-Era Music."

Example 2–5.

a. After Telesco's Example 18. An example of an omnibus cycle, in this case, the b^{o7} cycle.

Chord	#1	2	3	4	5														
	G^6_5	$B\flat^7$	d^6_4	$B\flat^4_2$	G^7														
						2	**3**	**4**	**5**										
				(E^6_5)	G^7	b^6_4	G^4_2	E^7											
								2	**3**	**4**	**5**								
							$(C\sharp^6_5)$	E^7	$g\sharp^6_4$	E^4_2	$C\sharp^7$								
												2	**3**	**4**	**5**				
										$(B\flat^6_5)$	$=D\flat^7$	f^6_4	$D\flat^4_2$	$B\flat^7$					
																2	**3**	**4**	**5**
																(G^6_5)	$B\flat^7$	d^6_4	$B\flat^4_2$	G^7

b. After Telesco's Example 19. A complete omnibus cycle with functional analysis.



Two triads related by the ***PR*** transformation exhibit a similar relationship to the first two dominant-sevenths of the omnibus (see Example 2–6, and compare with Example 2–5b); consequently, it is not too much of a stretch of the aural imagination to hear the triadic ***PR*** transformation as a subset of the omnibus. This subset concept can be a useful analytical tool for Dvořák's music, because the joints or seams between musical sections in his output often involve a triad/seventh-chord pairing rather than a triad/triad or seventh-chord/seventh-chord pairing and thus are less readily comprehended via the established analytical tools of parsimonious voice leading.

Several theorists have examined parsimonious transformations between and among seventh chords that often coincide with the diminished-seventh-chord matrix defined above.[21] As it pertains to Dvořák's use of seventh chords, the work of Richard Bass deserves mention here. Bass's discussion deals with the transformations between and among half-diminished seventh chords; he points out that by retaining two common tones, there are two transformations possible: 1) an ic 4–2 transform (or its reciprocal, the ic 2–4 transform) in which a minor third is held in common between two chords whose roots lie a minor third apart, and 2) an ic 5–5 transform in which the tritone is held in common between two chords whose roots are a tritone apart.[22] Example 2–7a reproduces the different transformations available in each one of three octatonic systems (OS).

Germane to our discussion here is Bass's identification of a series of half-diminished chords that appear in succession in the first movement of Dvořák's Ninth Symphony before the

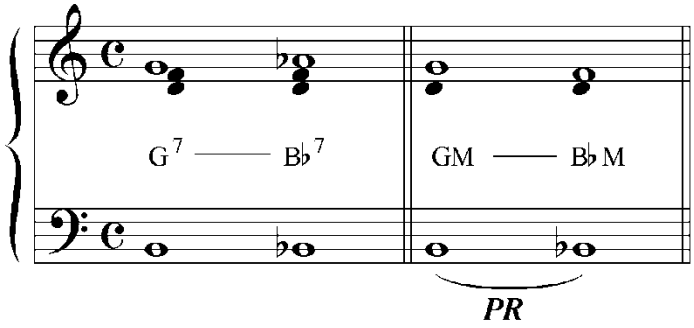
---

[21] See, for instance, Adrian Childs, "Moving Beyond Neo-Riemannian Triads: Exploring a Transformational Model for Seventh Chords." *Journal of Music Theory* 42, no. 2 (Autumn 1998), 181–93; Edward Gollin, "Some Aspects of Three-Dimensional *Tonnetze*," *Journal of Music Theory* 42, no. 2 (Autumn 1998), 195–206; and, more recently, Dmitri Tymoczko, *A Geometry of Music* (New York: Oxford University Press, 2011).

[22] See Richard Bass, "Half-Diminished Functions and Transformations in Late Romantic Music," 41–60, especially the discussion of Dvořák's "New World" Symphony .

recapitulation; see a reproduction of his analytical reduction in Example 2–7b. As we might expect, knowing the half-diminished chords and dominant seventh map onto each other by inversion, Bass's concept of ic 4–2 and ic 5–5 transforms can be applied to dominant sevenths as well.

Example 2–6. Comparison of omnibus chords 1 and 2 with a triadic ***PR*** transformation.

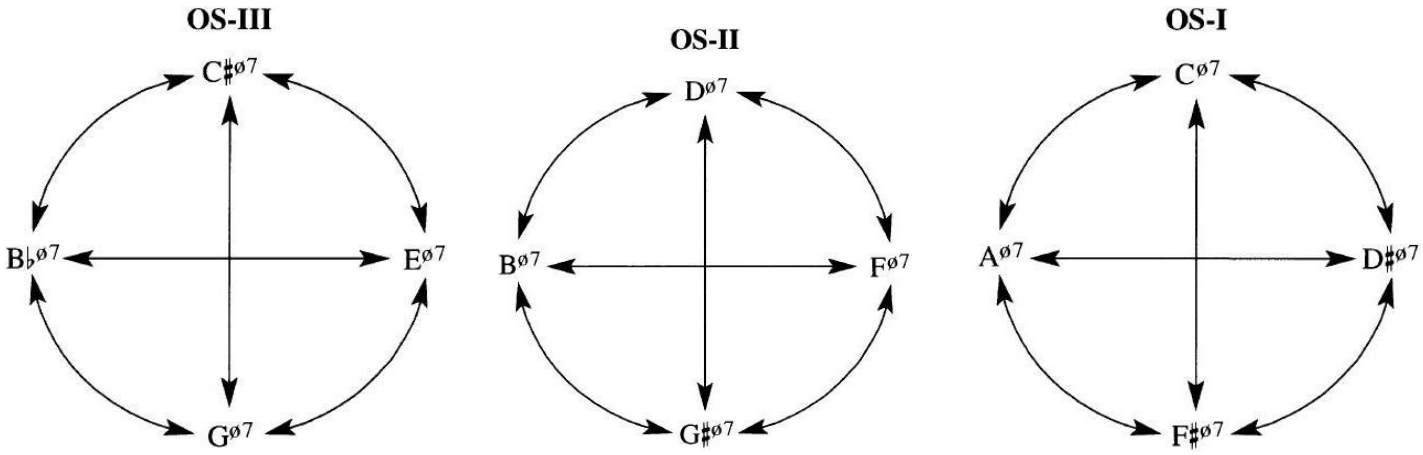


There is a convenient overlap between Bass's ic transforms and the omnibus; for instance, the first two chords in the omnibus of Example 2–5 are related by the ic 4–2 transform. I will occasionally use his ic 5–5 transform to describe omnibus-related chords that are not directly connected. Measures 27–30 of the opening movement of Dvořák's "Dumky" Trio, op. 90, instantiate such a transformation (see Example 2–8), the pitch-class content of which is very similar to Bass's OS–II. The "Coronation scene" from Mussorgsky's *Boris Godunov* (composed 1868–73) contains one of the earliest and most famous examples of this kind of juxtaposition of dominant sevenths whose roots are a tritone apart, although Clapham claims that Dvořák could not have known this music.[23]

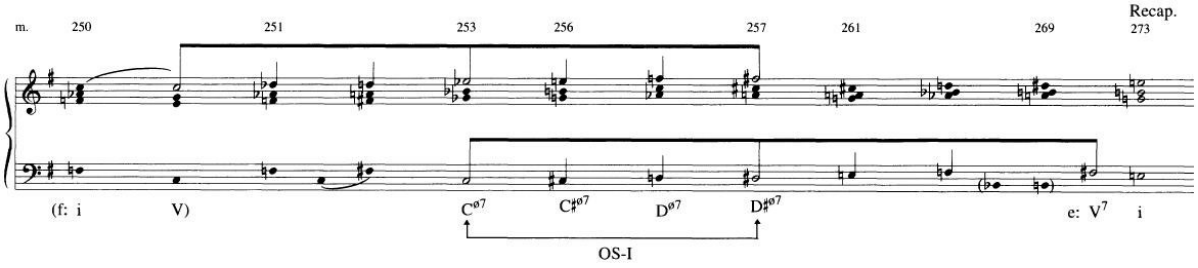
[23] Clapham, *Antonín Dvořák* (London: David and Charles, 1979), 275. Mussorgsky's opera was not performed outside Russia until after Dvořák died.

Example 2–7.

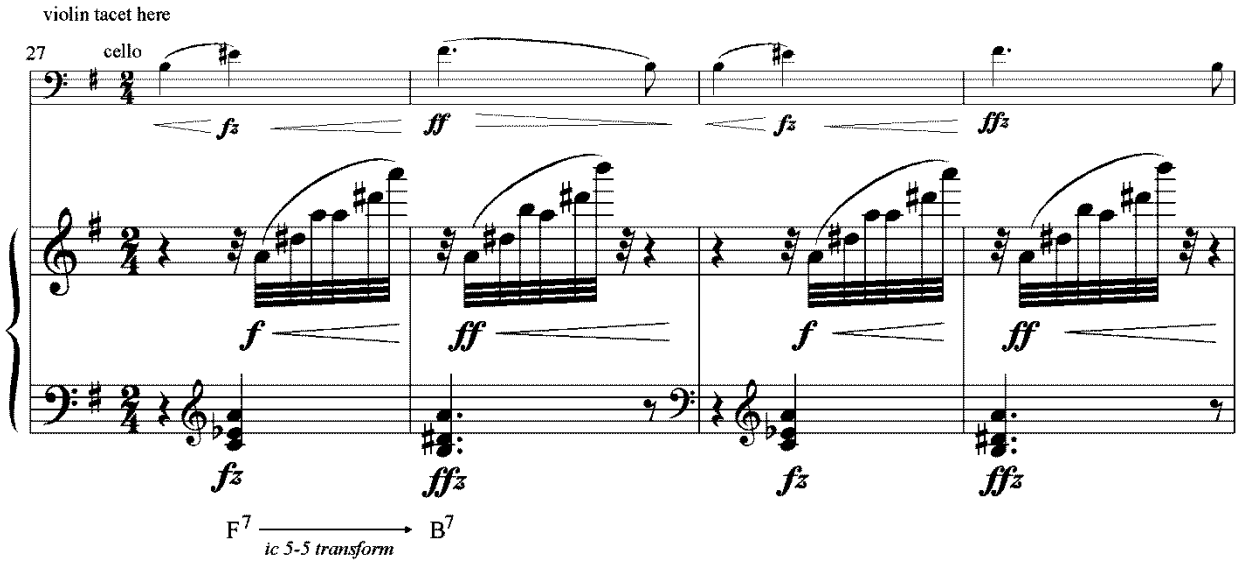
a. Bass's three octatonic systems; the ic 4–2 transform traces the circumference of each system; the ic 5–5 transform traces the diameter of each system.



b. Reproduction of Bass's harmonic reduction of Dvořák's "New World" Symphony, mm. 250–73.



Example 2–8. Dumky Trio, op. 90, i, mm. 27–30, demonstrating the ic 5–5 transform.



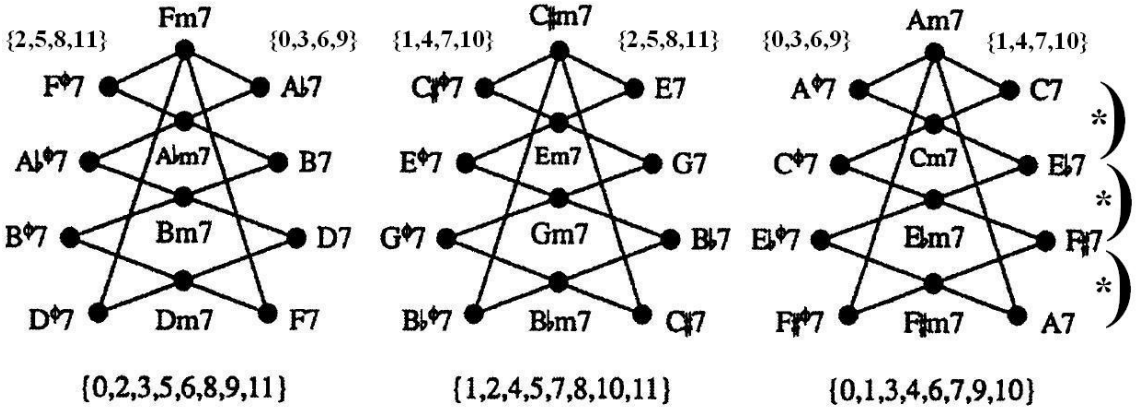
Bass's theory of half-diminished chords can be seen as a subset of a larger discussion across the music theory community on the nature of octatonic relationships. A visual representation of this can be seen in Example 2–9, taken from Douthett and Steinbach's article on parsimonious graphs; I have indicated in which OctaTower Bass's octatonic systems occur. [24]

Further, a fully-diminished seventh chord acts as a sort of background to each OctaTower; that is, the roots of each chord in the OctaTower taken together form a fully-diminished seventh and, with the exception of the minor-seventh chords, each chord is only one semitone removed from one of the three fully-diminished sevenths (which I have included in the braces above the left or right column of chords). Further, we can see that the adjacent dominant sevenths on the right of each OctaTower are omnibus-related by the ic 4–2 transform (shown by asterisks in the rightmost tower) and non-adjacent dominant sevenths are related by the ic 5-5

[24] The "Power Tower" model of seventh-chord transformation is presented by Jack Douthett and Peter Steinbach in "Parsimonious Graphs: A Study in Parsimony, Contextual Transformations, and Modes of Limited Transposition." They limit themselves to transformations among tetrachords whose interval classes are some permutation of 2, 3, 3, 4, and thus eliminate the major-seventh chord from their study.

transform. The chords from the "Dumky" Trio example shown above (F^7 and B^7) utilize the left-most OctaTower. Example 2–7b and Example 2–8 are but two brief cases where the foregoing theoretical models are useful for the analysis of Dvořák's music, especially at the surface or shallower middle-ground levels. The following analysis is meant to showcase the utility of these models in a more comprehensive way.

Example 2–9. After Douthett and Steinbach (1998), with additional annotations.

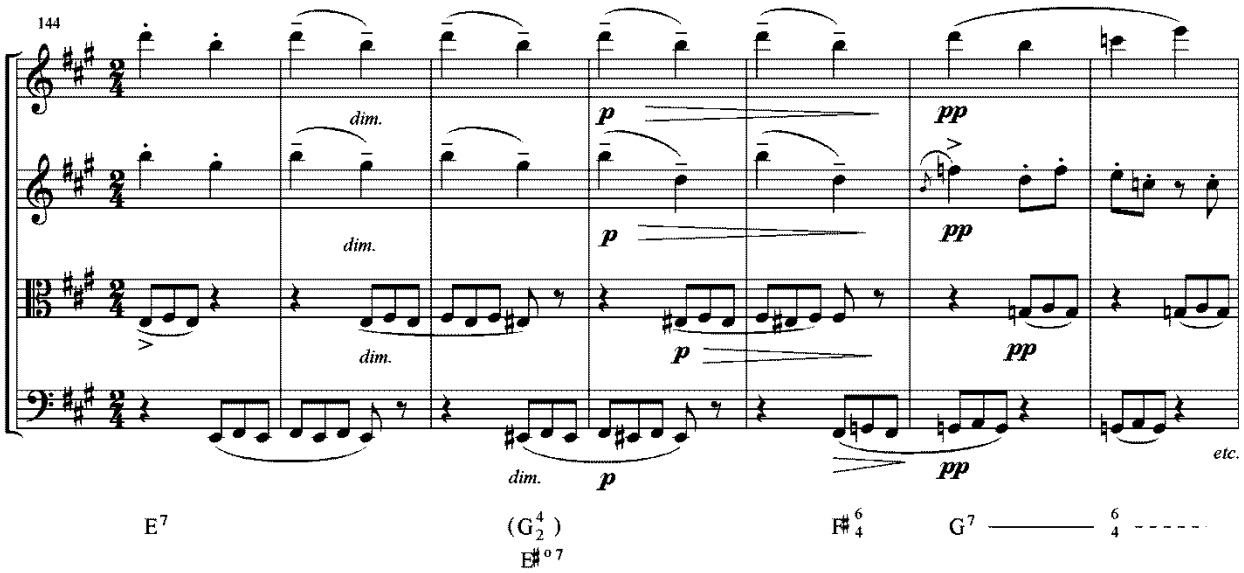


The Trio of the third movement of Dvořák's String Quartet in C Major, op. 61 (1881) contains a multitude of major- and minor-third relations at both the surface and shallow middleground levels; it is a fitting closing example for this section. The passage shown in Example 2–10 can be understood as an omnibus that unfolds a minor third from the dominant, E^7, to its own third, G^{7}.[25] $G\natural$ is a local *Stufe* of $E^{\text{major}}_{\text{minor}}$ and, in this case, is essentially decorated

[25] Dvořák uses $E\sharp^{o7}$ instead of a G^4_2, which is nearly identical to Vogler's conception of this pattern; see Telesco , "Enharmonicism and the Omnibus Progression in Classical-Era Music," 260–64 for other instances where diminished-seventh chords are used in omnibus-style progressions (also Wason, *Viennese Harmonic Theory*, 15–19).

by a melody suggesting C major. That this melody itself (mm. 149–56 and 221–28) is "in" C major does not change the fact that G is the ruling *Stufe*; it is audibly approached via the omnibus, is present as a pedal point the entire time, and there is no cadence in C major within the passage. Both times this melody occurs the music "snaps back" to resume the E pedal point (mm. 157 and 229), so that the entire omnibus progression to G, and the ensuing C-major melodic presentation, may be heard as a kind of high-relief but ultimately parenthetical statement.[26]

Example 2–10. Deployment of the omnibus in op. 61, iii, mm. 144–50.

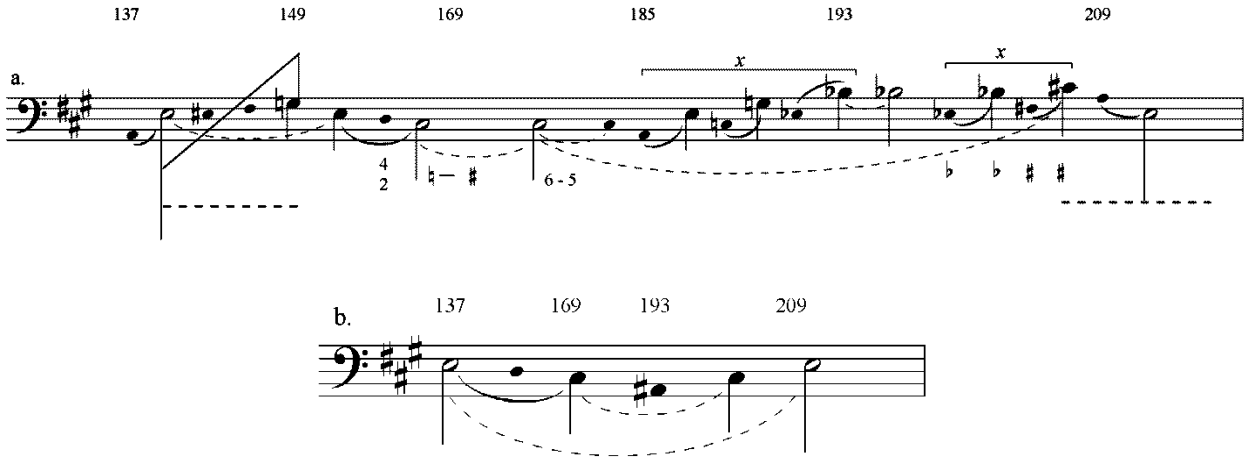


At a slightly deeper level, progressions by nested minor thirds prolong the dominant (see Example 2–11). Important themes are stated in C♯ and B♭ and are connected by an arpeggiation through a diminished-seventh chord. This is related to the concept that an arpeggiation of a

[26] Regarding the "snap back" to E: at the musical surface, the E dominant sevenths of mm. 157 and 229 are immediately preceded by C-major six-fours. Rather than reflecting the underlying omnibus progression, then, the surface harmonic action more closely resembles a type of ***LP*** hexatonic transformation (triad to seventh chord notwithstanding). We will often need to adapt traditional triadic transformational techniques to accommodate Dvořák's nearly ubiquitous use of seventh chords (as we did in Example 1–6, for instance).

seventh might express a step at a deeper level, except that in this case, the ascending arpeggiation of a diminished seventh, C♯–E–G–B♭, represents the descent from C♯ to A♯, an enharmonic minor third, at a deeper level (see Example 2–11b for this interpretation). As such, although the motion from mm. 185–210 represents an entire journey around the ***PR*** cycle, Dvořák is able to differentiate between nested hierarchical levels by thematically highlighting C♯ and B♭ (=A♯), respectively.

Example 2–11. Dominant prolongation the String Quartet, op. 61, iii, mm. 137–210.



The third-related harmonies in this example, especially at surface and middleground levels can be understood using the omnibus and transformational ***PLR*** techniques. These neo-Riemannian operators are generally understood to operate in a kind of tonality-free context, but in this instance, these analytical tools explain the manner in which large swaths of the Trio are organized better than traditional types of tonal analysis (where labels like "passing" or "prolongational" sometimes overlook the truly interesting musical details). In the case of the Trio, the dominant that lasts for over sixty measures is probably best explained by the

relationships among third-related triads ; in this instance, it seems, they do indeed provide the only means of organization at the deep middleground level of structure.

Dvořák's music, like that of Brahms, is most often based on diatonic processes at the deepest levels despite various (en)harmonic and chromatic excursions. It proves to be a fertile ground for a wedding of diverse types of analytic techniques. Ultimately, a comprehensive analysis must avail itself of many of these various methods to begin to achieve a satisfactory understanding of the work.

Mehrdeutigkeit.

Exact repetition was antithetical to the nineteenth-century musical aesthetic. Perhaps because of this, composers used various techniques to avoid redundancy. For example, they might harmonize a recurring melody or motive in a different way, or completely recompose repeated sections (such as recapitulations of sonata forms). By playing on the expectations of the listener—established generally by inherited musical conventions, or specifically by the distinctive features of an individual piece—composers could create nuance, contrast, and/or ambiguity. *Mehrdeutigkeit* ("multiple meaning") is a convenient expression to describe a stylistically competent listener's different possible interpretations of a musical passage .

The term *Mehrdeutigkeit* was introduced by Abbe Georg Vogler in the 1780s; it was significantly expanded and reified by Gottfried Weber in the 1820–30s. Weber defined the term as the possibility of explaining a musical event in more than one way. [27] More richly nuanced

[27] Janna Saslaw, "Gottfried Weber and Multiple Meaning," *Theoria*: *Historical Aspects of Music Theory* 5 (1990), 74–103. Saslaw translates the term as Multiple Meaning (although she notes alternate translations such as "multiple function"). Further exploration of the topic of *Mehrdeutigkeit* can be found in Jairo Moreno, "Subjectivity,

than the term "ambiguity," Weber's concept means that a listener will make certain assumptions about the tonal context of a note, interval, or chord until proven otherwise by following musical events, which might cause the listener to go back and explain the musical event differently. Chords capable of enharmonic respellings, such as the diminished-seventh or augmented-sixth chords, are ideally suited for use in creating ambiguous tonal contexts, although in Weber's conceptualization, *Mehrdeutigkeit* was most appropriate when considering a listener who was hearing a piece for the first time (a diachronic experience of a musical work). Retrospective analysis (or synchronic experience) of a passage could somewhat neutralize the harmonic ambiguity.

The opening chord of Dvořák's Humoresque, op. 101, no. 4 (see Example 2–12a) presents a good example of the kind of context that *Mehrdeutigkeit* helps to explain. Without a harmonic context, the initial seventh chord will probably be heard as a ii^7 rather than a vi^7, since the former is much more common in tonal music than the latter. This interpretation would be reinforced by the progression to a dominant seventh and following deceptive resolution in m. 2. Knowledgeable listeners might even imagine a continuation to a cadence based on the tonal implication of the first few chords. Example 2–12b presents one realization of how the phrase might have continued in the third and fourth measures.

As Dvořák wrote the passage, however, the augmented sixth chord in the third measure (marked with an asterisk in the example) derails the ear's understanding of the passage as in C major and points to the eventual cadence on the true tonic of F major. When the opening motive is repeated an octave higher at m. 5, the nature of the vi^7 chord is much less ambiguous (although there is always the possibility that it could be reinterpreted). The downbeat of m. 7 will also

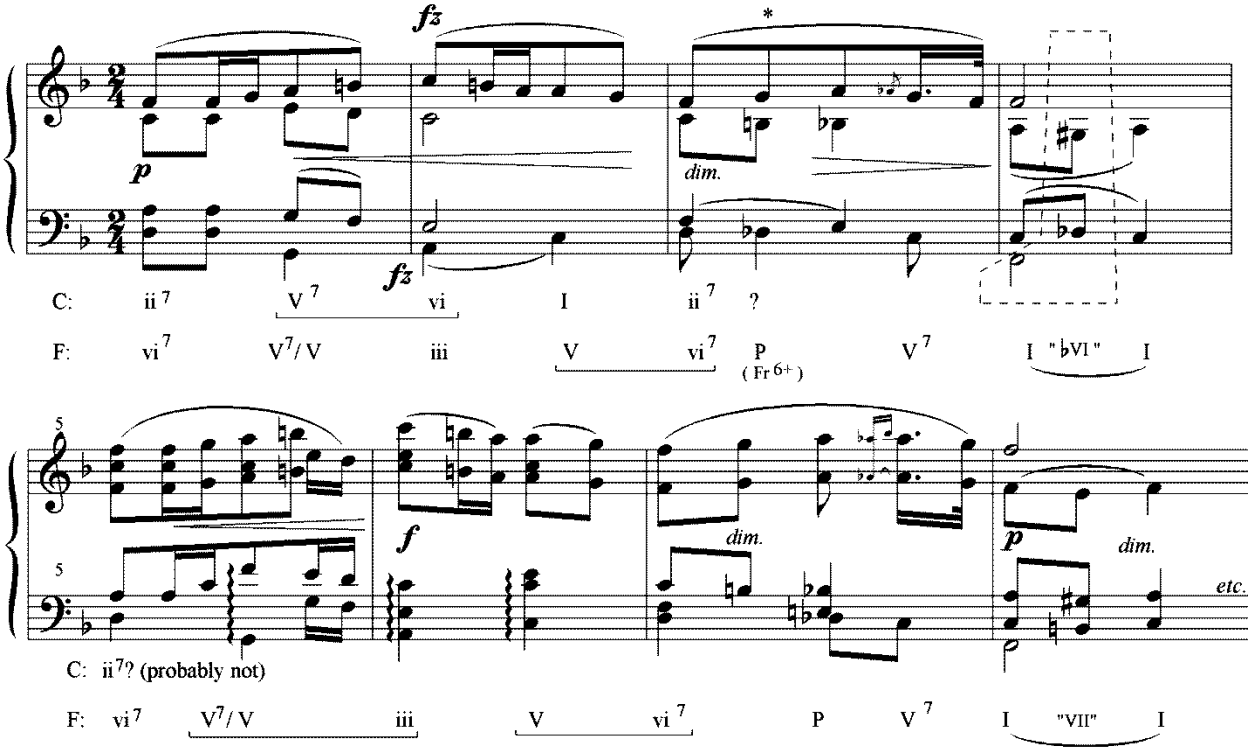
---

Interpretation, and Irony in Gottfried Weber's Analysis of Mozart's 'Dissonance' Quartet," *Music Theory Spectrum* 25, no. 1 (Spring 2003), 99–120.

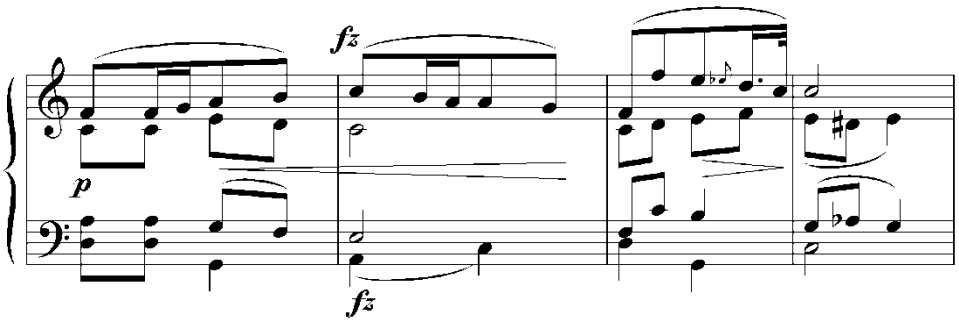
most likely be heard as vi^7, creating a motivic repetition of deceptive resolutions (shown by the square brackets). When the initial eight measures are repeated, there is even less ambiguity.

Example 2–12.

a. Humoresque, op. 101, no. 4, mm. 1–8. Opening minor-seventh chord invites multiple interpretations by the listener.



b. The first four measures recomposed to render the first chord without ambiguity.



There is another place where the application of *Mehrdeutigkeit* is possible in this example: the cadential decoration in the fourth measure has the aural profile of a ♭VI chord, although Dvořák's spelling highlights the neighboring aspect of each note, a neighboring aspect made more explicit in the rhyme of eighth measure (in the guise of a "VII" chord).

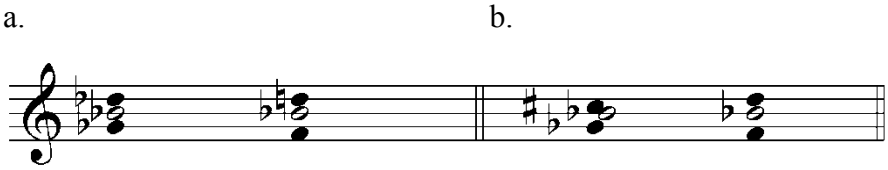
The listener's sense of *Mehrdeutigkeit* with regard to scale-degree function is particularly important in common-tone progressions in which there is a conflict between linear and harmonic interpretations of a pitch. For example, in the opening of Dvořák's Piano Quartet in E♭ Major, op. 87 (refer back to Example 2–4), a move from a G♭-major triad to a B♭-major triad gives the upward resolution of the pitch D♭ the aural signature of a C♯ (see Example 2–13). Of course, the verticality in Example 2–13b is visually awkward as a sign for what is essentially a triad (although, as a doubly augmented fourth, it would not be unprecedented as part of a respelled augmented-sixth chord). Proctor discusses just such a conflict in his discussion of Schubert's Piano Sonata in D Major, D. 850; Kopp points out that Proctor's discussion leads to a special version of the chromatic pitch that is neither completely linear nor completely harmonic in context.[28] These kinds of conflicts are endemic in later nineteenth-century music, which almost guarantee, contrary to contemporary theoretical writings (such as those by Helmholtz, Oettingen, and Riemann), that composers were using equally-tempered pitch space.[29]

Seventh chords and/or chromaticism need not be present for ambiguity. In the third movement of the Piano Trio in E Minor, op. 90, "Dumky," Dvořák is able to create a very real sense of tonal disorientation for the listener while strictly economizing on musical content. The

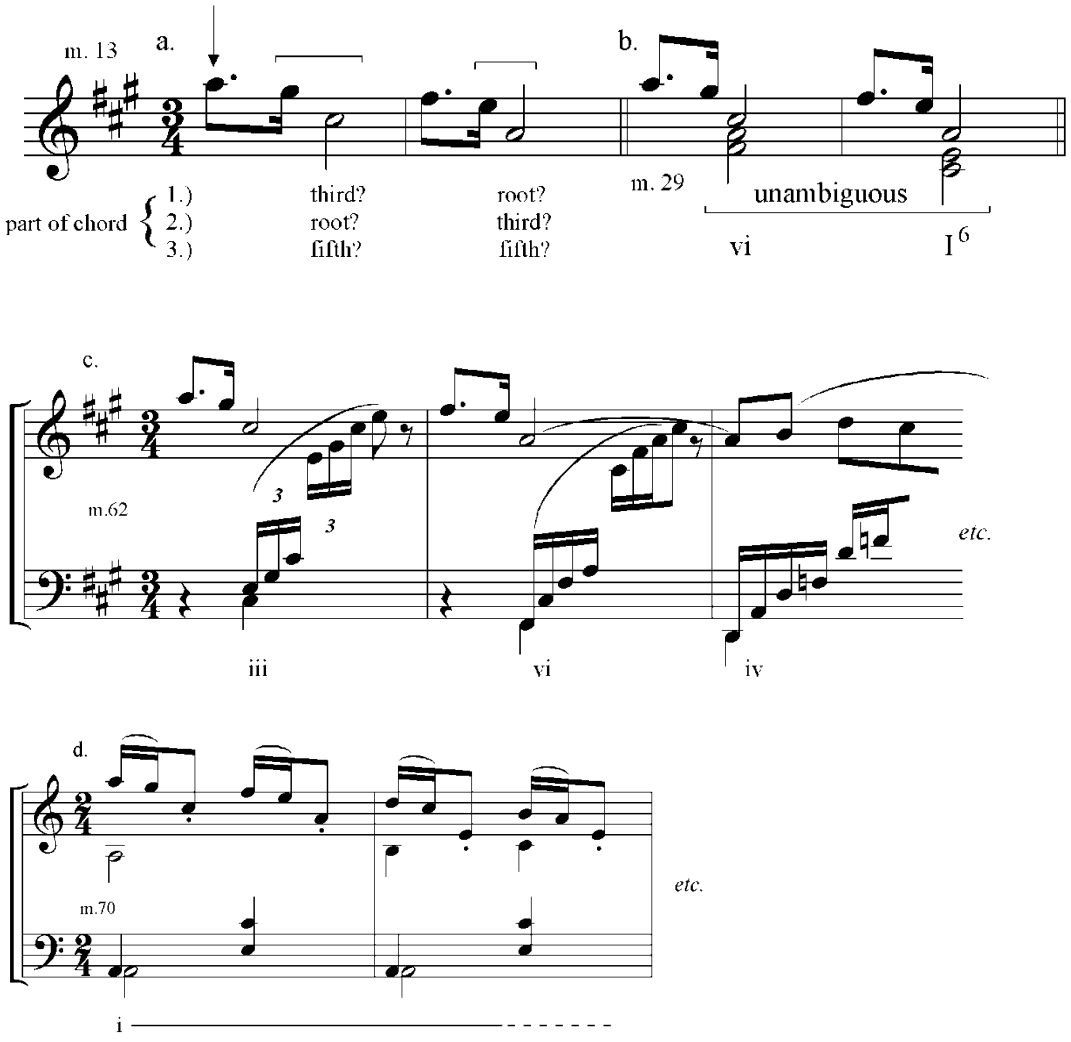
[28] Proctor, 131–32 and 140–43; Kopp, 80–83 and 132–134.
[29] Although for a modern reconsideration of an analytically viable justly tuned pitch-space, see Daniel Harrison's "Nonconformist Notions of Nineteenth-Century Enharmonicism," *Music Analysis* 21, no. 2 (2002), 115–160.

motive shown in **Example 2–14a** below is preceded by an unambiguous authentic cadence in A major (I–vi–V–I).

Example 2-13. An enharmonic reinterpretation of D♭ based on it linear resolution.



Example 2–14. Melodic content in the third movment of the "Dumky" Trio for which *Mehrdeutigkeit* captures the ambiguous nature of which scale degrees are being expressed.



Presenting a monophonic version of the motive first allows Dvořák to play with the listener's expectations. We might ask ourselves at first whether this gesture is a token of the sign "falling away from the leading tone" (as I identified it in the last chapter, pp. 46–48). Because there is no harmonic context other than chord tones on the beat, this might be a reasonable expectation. Alternately, the descending semitone followed by the falling fifth (marked by a bracket in the example) might activate our sense of "position finding," and we might then hear the passage as a small-scale $\hat{6}$–$\hat{5}$–$\hat{1}$ in C♯ minor (iii).[30] Incidentally, this would retrospectively change the A (marked by an arrow) from a chord tone (the root of the tonic chord) to an embellishing neighbor tone (the $\hat{6}$ of iii). Finally, given that the opening cadence articulates the submediant so clearly, we could also hear the motive as fully articulating a vi chord.

Our chosen interpretation will then color our interpretation of the following measure. Does Dvořák return to the tonic or articulate another harmony? If we heard the initial measure as the succession $\hat{6}$–$\hat{5}$–$\hat{1}$ in C♯ minor, the sequential nature of the second measure will lead our ear back to the tonic. On the other hand, hearing a motion to vi in the first measure might cause us to hear the entire two measures as articulating F♯ minor.

Through reharmonization over the course of the piece, Dvořák realizes all three implications of the motive's first measure (see Example 2–14b through Example 2–14d, the last of which is in the parallel minor). Despite its motivic economy, this movement of Dvořák's "Dumky" Trio displays a richness of musical expression, a richness of expression that epitomizes the concept of *Mehrdeutigkeit* by continually changing its harmonic interpretations of the initial motive.

---

[30] For a definition and exploration of "position finding," see Richmond Browne, "Tonal Implications of the Diatonic Set," *In Theory Only* 5, nos. 6–7 (Summer 1981), 3–21.

Chromatic sonorities through voice leading

There are numerous examples of striking passing sonorities in Dvořák's music. A more thorough discussion could probably stand alone as an independent study. I will examine a few instances where the kind of sonority Dvořák creates via melodic or rhythmic figuration coincides with modern explorations of the expansion of the nineteenth-century harmonic palette in the music of other composers.

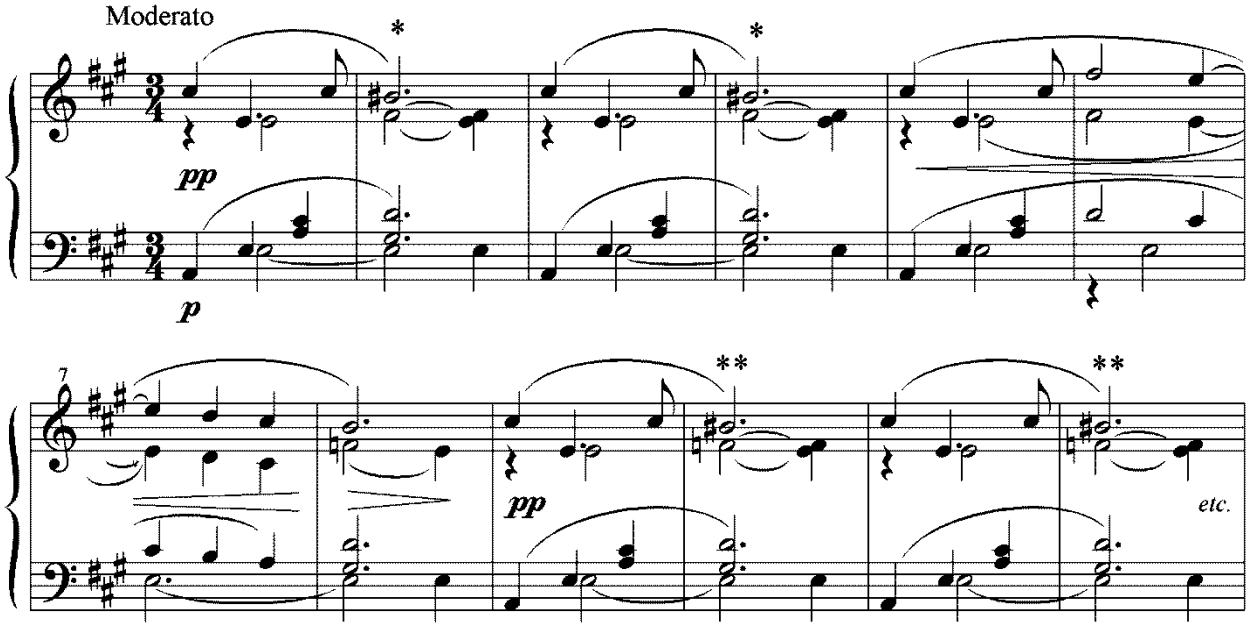
Dvořák's Waltz, op. 54, no. 1 (1879), seen in Example 2–15 below, exhibits a distinctive neighboring sonority, which is marked by an asterisk in the second and fourth measures. While it might be tempting to view the chord as an "augmented dominant ninth," we may yet profitably view it as some sort of augmented sixth sonority, especially since the underlying E is not part of its articulation; rather, it is tied over from the previous measure. The interlocking tritones F♯–B♯ and G♯–D give this chord the aural profile of a French sixth. The characteristic interval of the augmented sixth resolves to $\hat{3}$ instead of the more normative $\hat{5}$ of Classical practice, making this a good candidate to help illustrate Harrison's description of expanded role of the augmented sixth sonority in the late 1800s: in his terminology, this is a plagal-functioned augmented-sixth; that is, a tonic-resolving augmented sixth built above the subdominant scale degree.[31] Dvořák's use of the chord is motivic: it sets up a dyadic conflict between the B♯ ($\sharp\hat{2}$) of the chromatic chord with the melodic half cadence on B ($\natural\hat{2}$), which is echoed by the similar conflict between F♯ and F♮ ($\hat{6}$ and "♭"$\hat{6}$). At mm. 10 and 12, the substitution of F♮ for F♯ transforms the characteristic neighboring chord (marked with two asterisks) into what is essentially a half-

[31] Harrison, "Supplement to the Theory of Augmented-Sixth Chords," esp. pp. 187–94.

diminished-seventh sonority. This chord resolves as an augmented sixth; this is nearly the same procedure that Richard Strauss would use fifteen years later in *Till Eulenspiegels lustige Streiche* (1894–95).[32]

Despite their immediate resolutions back to the tonic, the augmented sixth chords of mm. 2, 4, 10 and 12 carry the implication of another key area. If they were allowed to "run their natural course" according to the traditional theories of the resolution of ethnic augmented sixths, they would articulate the dominant of the submediant (i.e., the C♯ acting as $\hat{3}$ of A major would be reinterpreted as $\hat{5}$ of F♯ minor).

Example 2–15. Waltz, op. 54, no. 1, mm. 1–12. Distinctive neighboring sonorities, including plagal-functioned augmented sixths (asterisks) and half-diminished sevenths acting as augmented sixths (double asterisks).



[32] Accordingly, the chord resembles what Harrison terms the "dual" German-sixth chord. See the discussion in Harrison "Supplement to the Theory of Augmented-Sixth Chords," 183–85, esp. in note 35. A similar discussion, that cites Harrison, regarding this treatment of the half-diminished seventh chord can be found in Richard Bass, Half-Diminished Functions and Transformations in Late Romantic Music," 44.

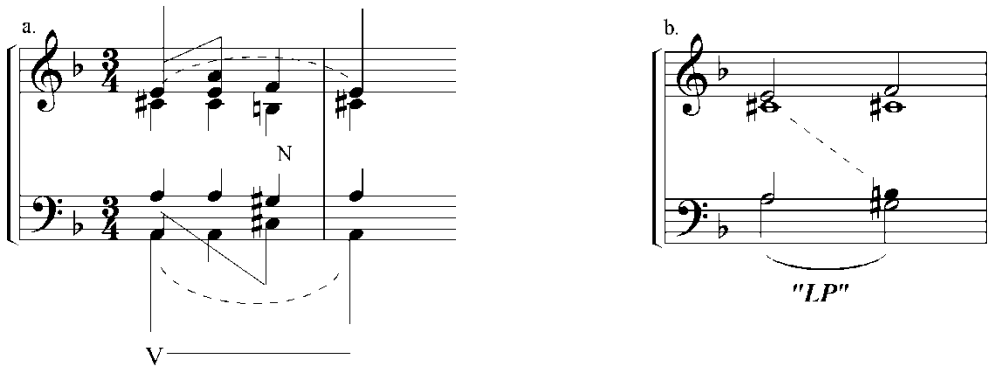
Indeed, the B section of the waltz begins in C♯ minor and cadences in F♯ minor (which then becomes the dominant of B minor). The avoidance of E as a key area (the global dominant) can perhaps be partly explained by Dvořák's realizing, at the larger scale, the implications of "predominant" function inherent in the augmented-sixth chord, as opposed to its more localized neighboring, "subdominant," tonic-resolving function.

The Fourth Symphony, op. 13 (1874), contains the following motivic gesture, first announced in mm. 33–34 (see Example 2–16a), as a decoration of the dominant. The neighboring harmony is enharmonically equivalent to a C♯ dominant seventh, but the analytical overlay clearly shows the embellishing character of the third beat. Disregarding its notation and considering the voice leading, however, it is remarkably close to the ***LP*** operation (e.g., A major to C♯ major). Perhaps we could call it ***L****; see Example 2–16b, in which the origin of B♮, being a whole step from either C♯ or A will be contextually determined. In Example 2–16a, we can see that the B♮ comes from the C♯. Because of the arpeggiation in the bass and the parsimonious nature of the voice-leading in the upper voices, the chord is harmonically striking but immediately intelligible. Another example of this sort can be seen in Example 2–38 on p. 143 below as it pertains to cadences. We have already seen how voice leading creates a formally implicative "magical" sonority in the opening of the String Quartet in C Major, op. 61 (see Example 1–16 in the last chapter).

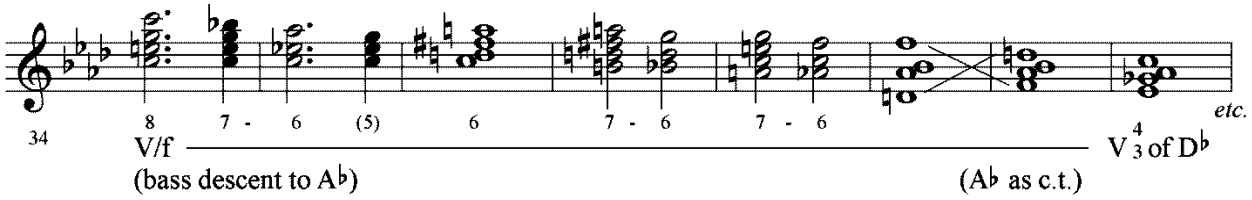
Of the many examples of voice leading as a generator of striking or exotic sonorities, Beveridge has identified the bridge of the first movement of the Piano Trio in F Minor, op. 65 (1883), as significant, especially as it instantiates a "long-delayed vindication of the penchant for

Phrygian cadences [that] Dvořák showed in his earliest works."[33] In Example 2–17 (adapted from Beveridge's Example VII–11), the harmonic integrity of the initiating harmony (dominant of F minor) is vitiated by the chromatic content of the voice-leading chords (their 7–6 motions describing a kind of modified fourth species), ultimately leading to a tonally ambiguous succession of harmonies linked by the common tone A♭. The remainder of the transition consists of the transformation of E♭ (the bass of the V^4_3 of D♭) into E♭♭ for the Phrygian approach to the second key area.

Example 2–16. a) Symphony no. 4, i, mm. 33–34; b) reduction of the same.



Example 2–17. Piano Trio in F Minor, i, mm. 34–41 (adapted from Beveridge's Example VII–11). Chromatic 7–6 sequential material transforms C major (as V of F minor) into a dominant-seventh on A♭.



[33] Both opp. 1 and 2 approach their recapitulations by augmented-sixth chords above ♭$\hat{2}$, "but without the harmonic-linear technique required to make the gesture convincing." See Beveridge, *Romantic Ideas in a Classical Frame*, 312.

One of the richest ways Dvořák creates exciting moments of tension is through dramatic build-ups comprising the extended use of contrary motion between voices, i.e., wedge progressions; this often created chromatically striking voice-leading harmonies.[34] Dvořák made extensive use of wedge progressions in his works at both small and large scales, though only Wagner and Tchaikovsky are cited as exemplars of the technique by Robert Gauldin in his study of this device in the later 1800s.[35] An example of a small-scale use of the wedge is the recurring plagal cadence of the fourth Slavonic Dance, op. 72 (written in 1886, see Example 2–18a), in which the bass arpeggiates through iv while the wedge leads from a unison D♭ to an octave on F.[36] Another small-scale, converging wedge can be found in *Othello*, op. 93 (1892); see Example 2-18b. Significant here is the apparent "C minor" harmony of m. 225, the result of the various voice-leading tendencies of the passage: D♯ and C♮ as the applied leading tone and local "♭"$\hat{6}$ of the supertonic, respectively. Incidentally, even after the predominant ii chord is established in m. 227, the wedge process continues. The leap from E to G in the bass is significant, however, because it emphasizes the harmonic nature of the predominant (ii to ii$^{\text{ø}6}_{5}$); Dvořák could have connected the E and G in the bass by step had he so desired but the smoothness of the voice leading would have masked the signal of arrival of predominant function that the dotted half notes and the small leap in the bass suggest.

Example 2–18c shows a passage from the development of the Romance, op. 11 (1873, revised 1877), mm. 101–111, which comes on the heels of a passage in descending fifths (which

---

[34] For a diatonic wedge progression, see Example 2–23 below.

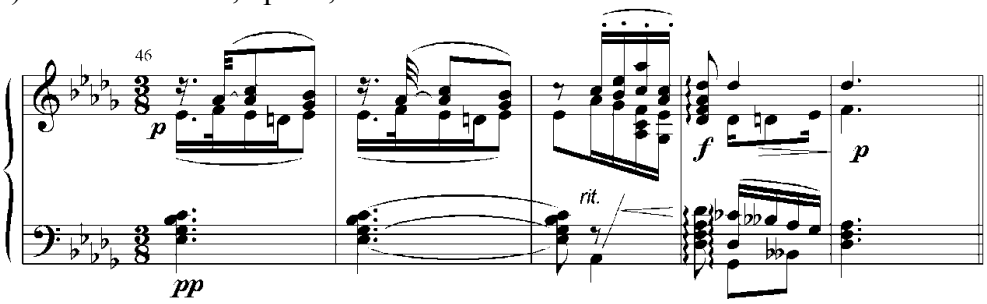
[35] See Robert Gauldin, "The Theory and Practice of Chromatic Wedge Progressions in Romantic Music," *Music Theory Spectrum* 26, no. 1 (Spring 2004), 1–22. Gauldin mentions points of congruence between his presentation and Telesco's discussion of the omnibus.

[36] Dvořák varies this cadence at the end of the dance by substituting G♮ and E♮ in the penultimate chord, emphasizing the final $\hat{5}$–$\hat{1}$ cadential gesture (not shown in Example 2–18a).

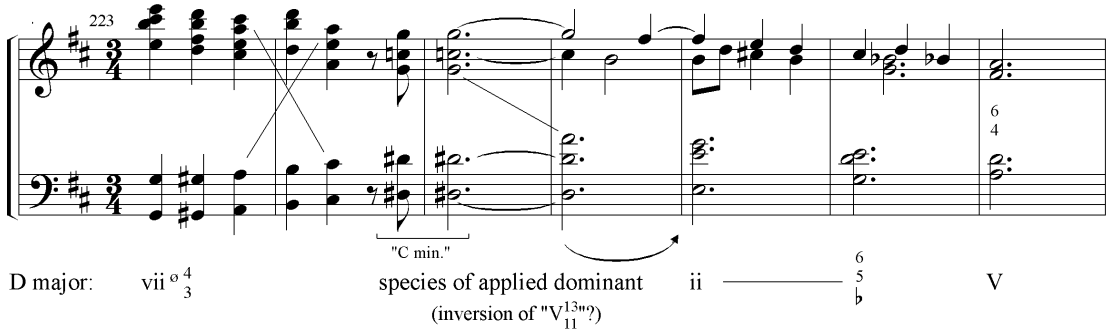
moves, characteristically, through the tonic to the subdominant). Dvořák uses a series of wedge figures to dramatize the cadential motion, immediately preceding the recapitulation, from subdominant to dominant.

Example 2–18. Wedge progressions in several works.

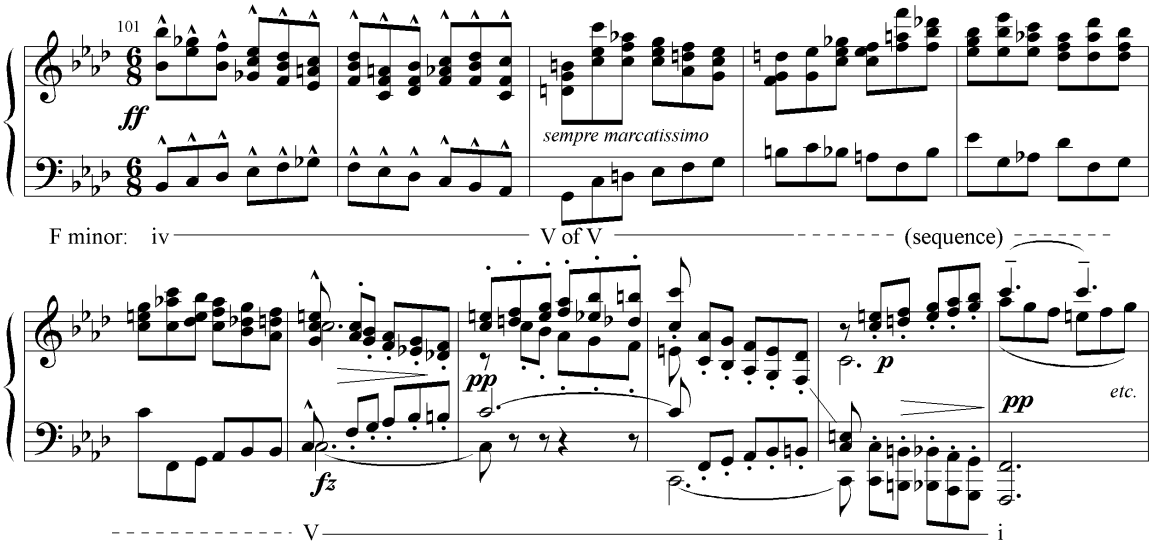
a) Slavonic Dance, op. 72, no. 4.



b) *Othello*, op. 93, m. 223ff.

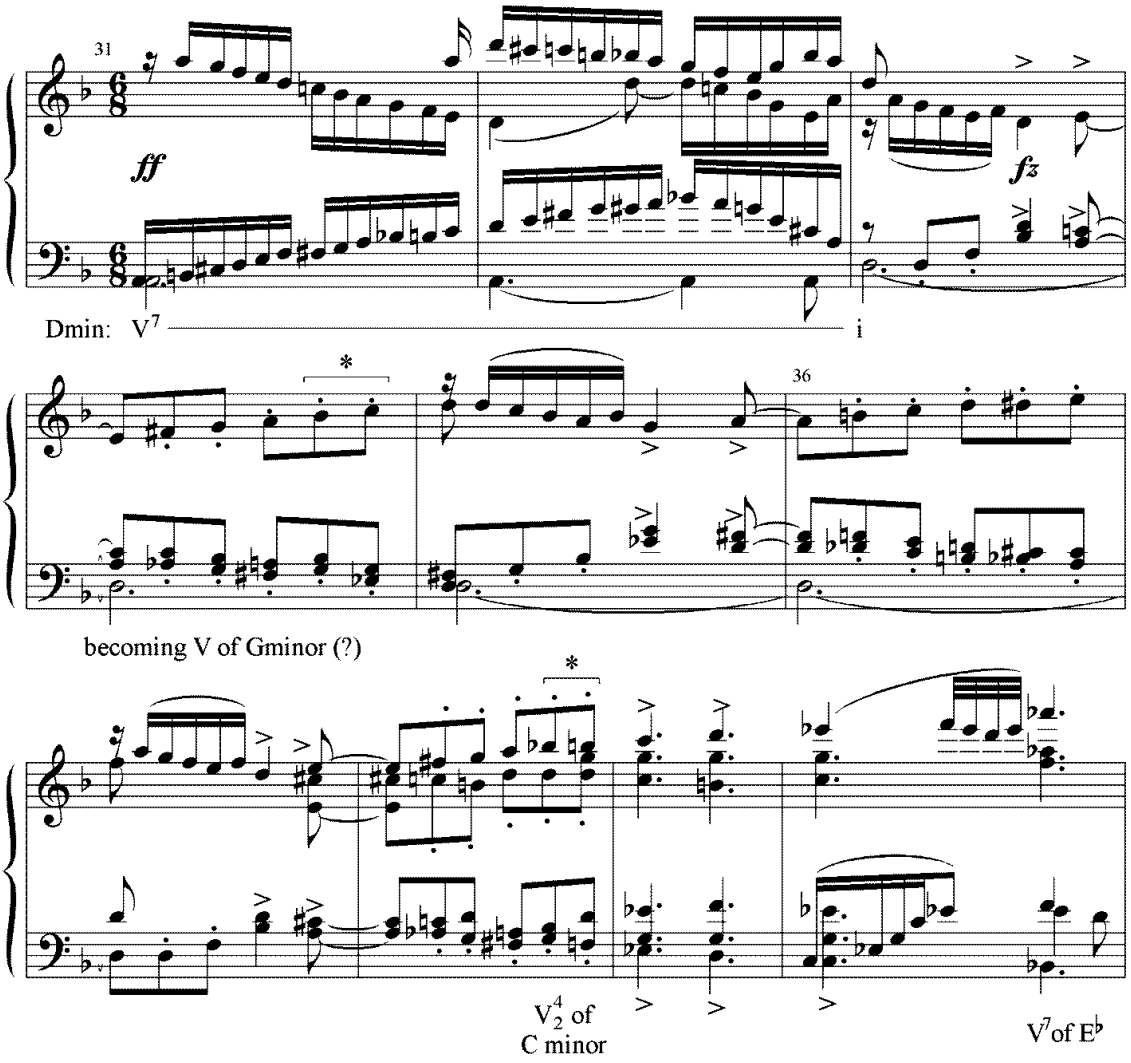


c) Romance, op. 11, m. 101ff.



Example 2–18. continued.

d) Seventh Symphony, op. 70, first movement, m. 31ff.



The most dramatic of the three examples I have chosen to include in this brief exploration of the wedge process in Dvořák's music is a remarkable ten-measure passage from the first movement of the Seventh Symphony (1885). Convergent and divergent wedges help propel the music from a cadential six-four in m. 31 to the dominant of the Neapolitan in m. 41, the reduction of which is given in Example 2–18d. Dvořák is able to divert the harmonic trajectory

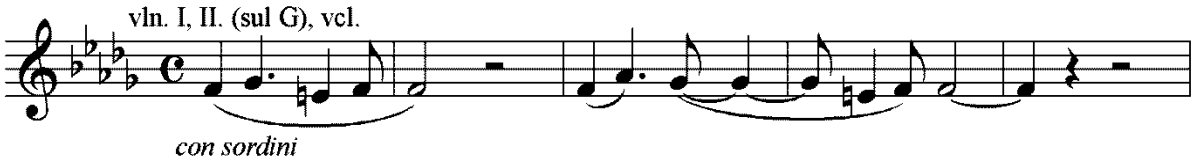
of the third statement of the wedge (m. 37) by changing the final chord of the measure to a V_2^4 of C minor (vi of E♭ major—compare the chords under the brackets with asterisks). The menagerie of chords created through the contrary motion (various species of augmented sixths, seventh chords, non-functional root-position triads, and some others) help create the instability we would expect for typical transitional material, but on a scale here that matches Dvořák's monumental aims for the symphony.[37]

Perhaps Dvořák's Requiem, op. 89 (1890), is the best representative—as a kind of compendium—of the chromatic techniques discussed throughout this section (third-related harmonies, *Mehrdeutigkeit*, etc.); as discussed in the prior chapter, there are several portions of this work that seem inspired by Wagner's harmonic practice. Although it is quite a long piece, it is unified by the cyclical use of a chromatic, syncopated motive or motto (shown in Example 2–19a). This motto informs the opening choral statement shown in Example 2–19b (the continuing note in the tenors, not shown, is C♭). The chord progression is reminiscent of the Tarnhelm leitmotiv from Wagner's *Ring* and evinces the important role chromatic mediant relationships will play in Dvořák's work.

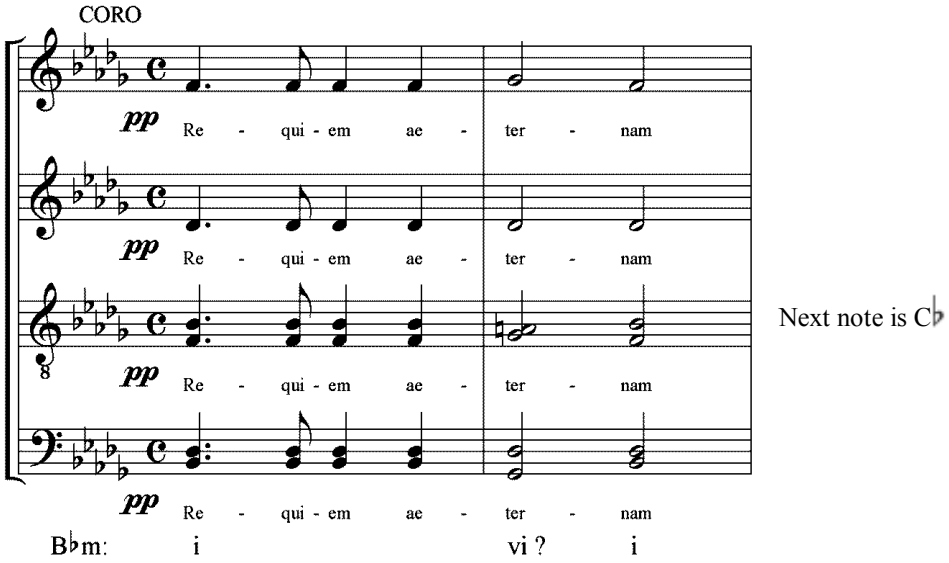
[37] According to Clapham, *Antonín Dvořák*, 72, Dvořák wrote to his publisher Simrock in 1885 saying, "…I have been busy for a long, long time over my new symphony, but I want to justify Brahms's words when he said, 'I imagine your symphony will be quite unlike this one [the Sixth Symphony].'" From a rhythmic standpoint, the instability of the hemolia figure (with its ties over the bar lines) reinforces the transitional rhetoric. Measure 61ff of the first movement is also interesting as it relates to the idea of both wedge progressions and derivations of exotic chords by voice leading, and we have already discussed the approach to the coda in the last chapter (**pp. 18**–**22**).

Example 2–19.

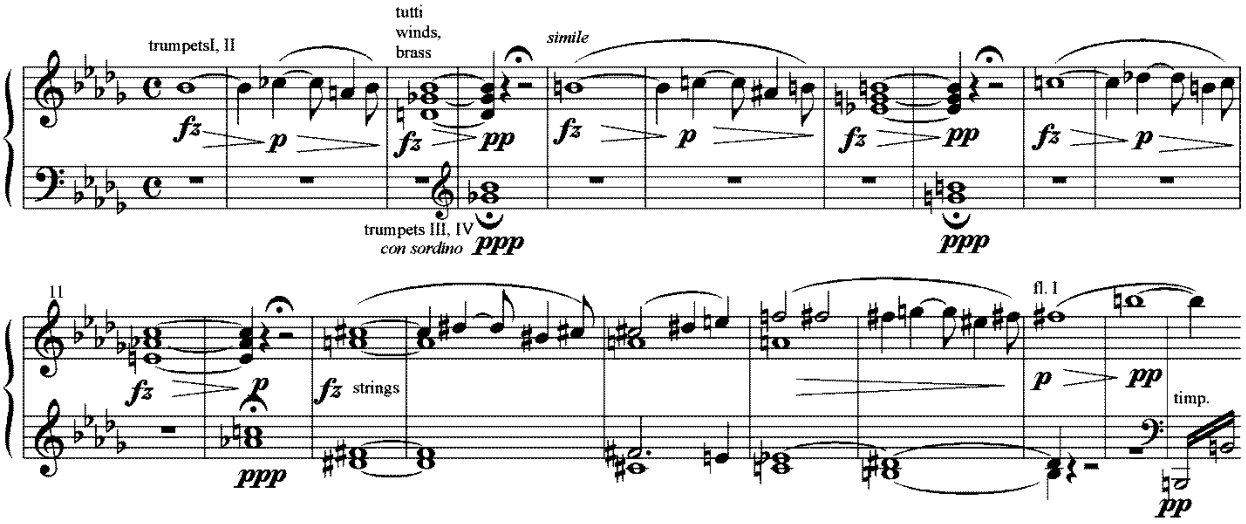
a. Requiem, initial presentation of the motto, mm. 1–5, unison violin and violoncello.



b. Requiem, opening choral statement, m. 11. Neighbor tones in tenors related to motto.



c. Requiem, "Tuba Mirum" mm. 1–20, motto harmonized by augmented triads.



Rey Longyear and Kate Covington, writing on motivic manipulation and harmonic structure in this work, have examined many of the ways in which the motto is treated, so I will limit my discussion to only one element of the work, which acts as a kind of synecdoche.[38] Example 2–19c shows how the motto is harmonized by augmented triads; apropos of Dvořák's use of this sonority in the Requiem, I must mention R. Larry Todd's examination of the augmented triad in the theory and practice of the 1700–1800s, including its topical use to represent doubt, suffering, and even death.[39] Any member of the augmented triad can serve as a leading tone to a putative chord root. Initially it seems that this will be Dvořák's use (in the fifth measure, B♭ acts as an A♯ that leads to B♮, the root of a seeming i^6); each successive "root," however, becomes the first note of a real sequence of that motto, so that the passage does not resolve in any meaningful way until the non-sequential fourth statement, at which point the harmonic context suggests the dominant of E minor (and incidentally, the strings intone an almost *Tristan*-esque version of the motto, complete with half-diminished chord). In this way, Dvořák effectively uses the augmented triad as an agent to induce the listener's sense of *Mehrdeutigkeit*.[40]

Consisting as it does of semitones above and below a central note (usually a tonic or dominant), the motto exerts an influence on chords at cadences that Longyear and Covington find particularly pronounced: "When Dvořák is not preparing a cadence by a sudden and unexpected progression…he often uses Neapolitans, diminished sevenths acting as vii^{o7} of the

---

[38] See Rey M. Longyear and Kate R. Covington, "Motivic Unity and Harmonic Variety in Dvořák's *Requiem*," 51–64. The chromaticism in the piece is so rich and variegated, and juxtaposed as it is against moments of almost Baroque (Handelian) conservatism, it could easily support a book-length study all of its own.

[39] See R. Larry Todd, "Franz Liszt, Carl Friedrich Weitzmann and the Augmented Triad." Todd's discussion of Weitzmann's conception of the augmented triad is especially useful for an understanding of nineteenth-century thought on the matter. As discussed in the last chapter, Dvořák did admire Liszt's works, especially the tone poems and sacred oratorios; his use of the augmented triad in this context is quite Lisztian.

[40] A similar treatment of the motto, but with diminished-seventh chords, can be found in the "Lacrymosa."

dominant, and German sixths, often unusually voiced."[41] Dvořák employed many modern chromatic techniques in the Requiem and, in the words of Longyear and Covington, "by so doing looks forward to the musical future in the same sense as his other progressive contemporaries Grieg, Rimsky-Korsakov, and Fauré."[42]

I hope to have shown in this section on chromatic harmony that Dvořák was a full participant in the nineteenth-century "lust for fresh compounds of thirds, nonharmonic tones, and chromaticizations" (as per Dahlhaus's epigraph for this chapter). This is not to say these "fresh sounds" fully determine Dvořák's style; on the contrary, as I have stated before, Dvořák learned over time how to reconcile novel harmonic techniques with intelligible formal practices. This being said, compositional techniques become part of a style only when they are instantiated over many pieces in the repertoire. Thus, though he was not always a pioneer of certain chromatic procedures, Dvořák helped shape the late nineteenth century aesthetic through his use of devices such as, among others, chromatic mediants, juxtaposed seventh chords (including those within the omnibus), and the often strikingly original harmonies he achieved through voice-leading procedures, such as the wedge progression.

[41] Longyear and Covington, 57. As part of the discussion they note that "the augmented sixth is the inversion of the diminished third, the interval formed by those half steps above and below the tonic or dominant."
[42] Ibid., p. 61.

II. Enriched Diatonic Function

Although the expansion of diatonic space in the nineteenth century was perhaps not as wide-ranging as the expansion of chromatic space, it was driven by composers' use of such devices as modality, pentatonicism, and diatonic embellishment of fundamental harmonies (usually through voice-leading). Dvořák, employing these techniques, was especially adept at creating fresh, non-Classical sonorities without resorting to chromaticism.

Modality.

Modality necessarily belongs under the rubric of diatonicism, as the intervallic properties of the scale are consistent and give the mode its particular character. Against the received tradition of major-minor tonality, however, the use of modes by nineteenth-century composers would have evoked a sense of chromaticism to contemporary audiences and often will to twenty-first century audiences. For instance, a Lydian fourth, while diatonic to the Lydian mode, sounds chromatic compared to the stylistically more normative parallel major mode. If a composer such as Brahms or Dvořák uses modality for only a portion of a piece, and converts (or reverts) to tonality later in the piece, the modal section will be heard as chromatic. Modality is a kind of bridge between the world of the diatonic major-minor tonal system and a chromatically saturated common-tone one (the kind explored by, for example, Neo-Riemannian theorists).

As Nicole Biamonte notes, aspects of Romantic idealism contributed to a renewed interest in modes during the 1800s: "the historicist preoccupation with the Middle Ages, a resurgence of spirituality and mysticism, the growing prestige of folk music, rooted in

primitivism and the glorification of the pastoral as well as in nationalism, exoticism, and post-Revolution egalitarianism, and a simple quest for new harmonic sounds."[43] Although Biamonte was writing specifically about German Romanticism, it is not hard to see that several of these ideas directly speak to Dvořák's style, especially spiritualism (given his strong Catholic background), folk music (where both pastoral and nationalism are important), and simply the quest for new harmonies. Biamonte lists five categories that provide a spectrum from relatively weak modal affinity to unadulterated modality. Within each category, too, it seems that there is a spectrum from a weak effect to a strong one. Biamonte's five categories of modal affinity, to which I shall refer throughout this section, are as follows:[44]

1) **Modal allusion**: fundamentally tonal music that alludes to modality in some oblique way; neither the harmony nor the melody is explicitly modal, but the work employs a texture or convention typical of modal music. This category includes works Biamonte does not consider modal but that have been defined as such by other writers.

2) **Modal inflection**: fundamentally tonal music that nonetheless incorporates one or two elements of modality, such as the temporary or local use of a modal scale degree, a harmony specific to or characteristic of the mode, or some combination of these.

3) **Modal melody**: a melody conforming with some consistency to one of the modal octave species (including Aeolian, but not Ionian), either unharmonized or harmonized tonally.

---

[43] Biamonte, *The Modes in the Music of Beethoven, Schumann, and Brahms*, 2. Also, Daniel Harrison traces a nineteenth-century awakening of theoretical interest in modes and exotic scales to Mortiz Hauptmann's mid-century writings. Harrison *Harmonic Function in Chromatic Music*, 230–31.

[44] Biamonte, 4.

4) **Modal harmony**: this category includes the nineteenth-century construct of modal harmony—music placing an emphasis on secondary triads, and in which some traditional harmonic functions are subverted—as well as the large scale use of a modal harmony such as ♭VII or v.

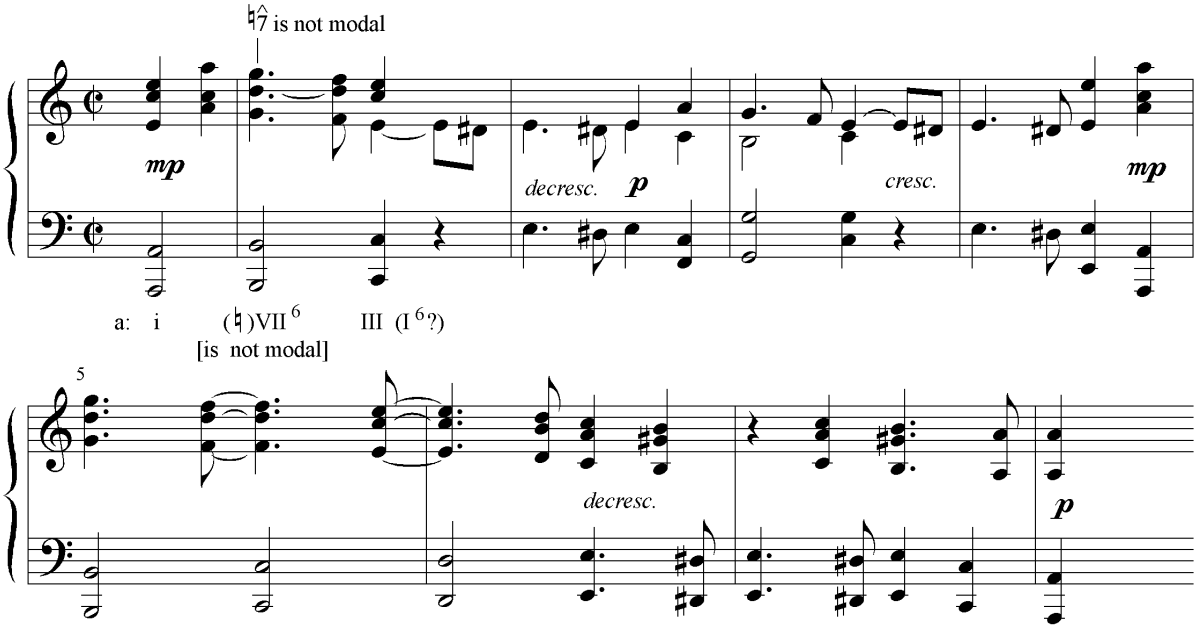
5) **Modality**: a work or significant passage in a work (such as a first or second theme) that is unequivocally modal rather than tonal, in which the melody conforms to a particular modal octave species and the supporting harmonies are diatonic to that mode. The strictest version of modality would show no vestiges of tonal functionality, but such a construct is more common in twentieth-century music than nineteenth-century music.

The most important indicators of Dvořák's modal practice are ♯$\hat{4}$ and ♭$\hat{7}$. In major, these are emblematic of the Lydian and Mixolydian modes, respectively. In minor, ♯$\hat{4}$ is emblematic of a species of harmonic minor—sometimes recognized as a type of Hungarian gypsy scale, other times referred to as the so-called "double harmonic" minor scale, familiar in Russian pieces such as Tchaikovsky's *Marche Slave*, op. 31 (1876)—and ♭$\hat{7}$ can be emblematic of the Dorian or Aeolian mode. With respect to the latter, it is very important to draw a distinction between normative tonal practice and modal practice.

In tonal practice, $\hat{7}$ of the minor mode is variable. That is, it is usually lowered when descending and raised when ascending; the mere presence of lowered $\hat{7}$ (or ♭VII) does not automatically place a piece in the Aeolian mode. Factors such as harmonization and melodic context of the pitch (direction) are of paramount importance. Generally speaking, the descending tetrachord from $\hat{8}$–$\hat{5}$ incorporating the subtonic is not modal, as Biamonte seems to

suggest when she cites Brahms's Intermezzo, op. 76, no. 7 (Example 2–20), as a clear example of modal harmony (to illustrate her fourth category of modal affinity). On the contrary, Brahms's harmonization is typical for the melodically descending minor tetrachord. The substitution of III for i^6 is extremely common in minor, especially when it facilitates the subtonic passing tone; indeed, Biamonte herself writes that "the modal character of the first measures of the Intermezzo would be stronger if Brahms had progressed from ♭VII^6 back to i."[45] While I agree with her that progressions such as v–i and ♭VII–i or ♭VII–I are modally inflected (and ♭VII^6–i^6 may be modal depending on context), the ♭VII^6–III in Brahms's Intermezzo most probably is not (nor is the root position ♭VII–III in the second statement of the theme).[46]

Example 2–20. Brahms, Intermezzo, op. 76, no. 7, mm. 1–8. In the minor mode, ♭VII is not necessarily modal.



[45] Biamonte, 227.

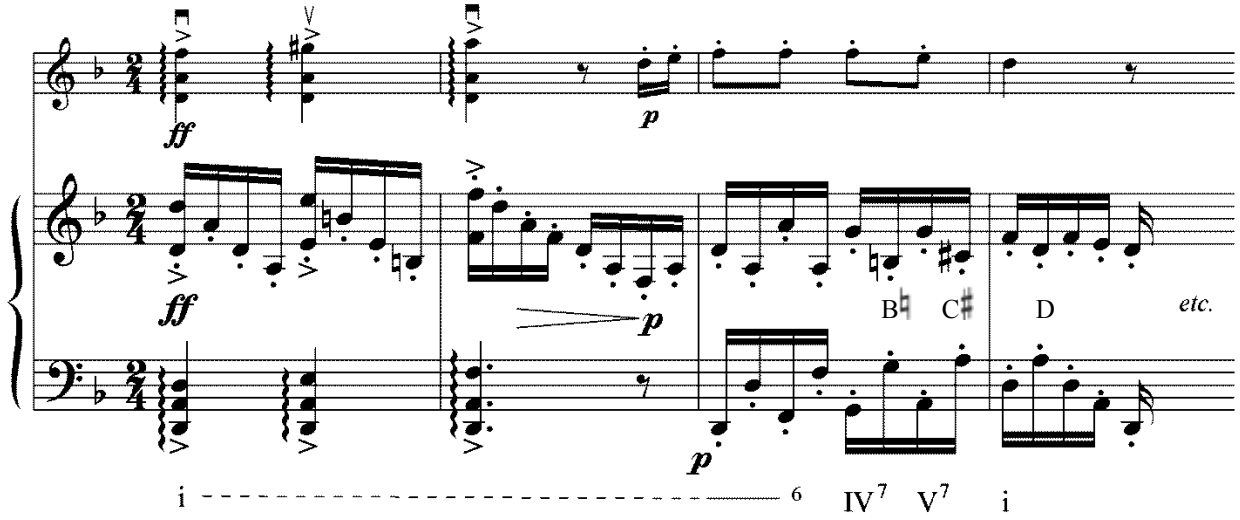
[46] Aldwell and Schachter explicitly mention the diatonic nature of the progression found in the Intermezzo in *Harmony and Voice Leading*, 3rd edition (New York: Schirmer, 2002), 236–37. Schenker's graph of the Intermezzo (in *Der Freie Satz*, § 217, Fig. 91,5), in which the descending tetrachord from $\hat{8}$–$\hat{5}$ is the first melodic action in a freely-interrupted octave line (harmonized by an arpeggiation to III), is manifestly diatonic.

As it pertains to Dvořák's music, many more appropriate examples of modal harmony and/or modal inflection can be found below, especially with regard to lowered $\hat{7}$ as a cadential agent (see Examples 2–33, 2–34, 2–35, and 2–36). In each of these cases, it is the *ascent* of $\flat\hat{7}$ that imparts modal affinity. For instance, the use of the Moravian modulation in major (seen in the last chapter, Example 1–12) is modally unambiguous; it clearly invokes Mixolydian (without being *in* Mixolydian). In minor, the Moravian modulation may only be seen as modally referential depending on the surrounding harmonic context. If ♭VII moves directly back to i, the Moravian modulation is modal; if ♭VII proceeds to III, the Moravian modulation might be more correctly analyzed as part of V–I motion in the relative major.

Most of Biamonte's examples of modal affinities for Beethoven and Schumann fall into her first two categories, allusion and inflection. That is, they are otherwise tonal. Her exploration of Brahms's music, on the other hand, more often than not identifies his music as falling into the two latter categories of modal harmony and pure modality. Though Dvořák's music is less frequently purely modal like Brahms's, it more often contains modal inflection (probably a contributing factor in the assessment of his music as nationalistic by contemporary listeners). The first two measures of the Romantic Pieces, op. 75b, no. 2 (Example 2–21a), contain a good example of $\sharp\hat{4}$ in minor as well as the raised, Dorian $\hat{6}$. In the passage shown in Example 2–21b, the folk-like character formed by the augmented second between $\hat{3}$ and $\sharp\hat{4}$ and the downward resolution of the Dorian sixth create a colorful modal inflection without disturbing the tonality of the entire passage (the raised $\hat{6}$ of the IV^7 in m. 3 is not modal, being typical voice leading for an ascent from $\hat{5}$–$\hat{8}$).

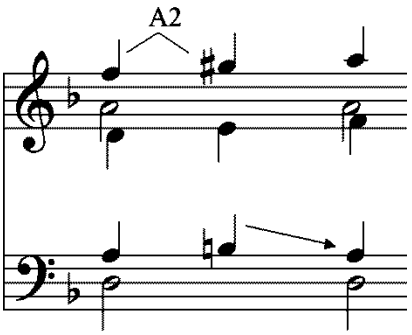
Example 2–21.

a. Opening four measures of Dvořák's Romantic Pieces, op. 75, no. 2. Contains a raised $\hat{4}$ and a Dorian sixth.



(Dorian sixth) (not a Dorian sixth)

b. Dvořák, Romantic Pieces, op. 75, no. 2, reduction of measures 1–2.

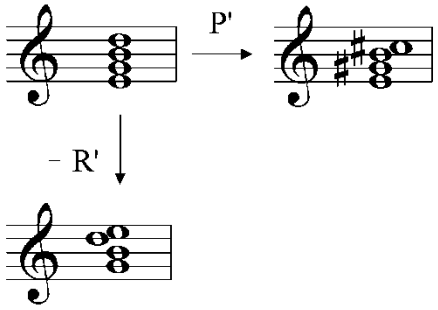


Benedict Taylor has explored the modal nature of Dvořák's American works, especially as they pertain to four-note chords.[47] He uses Dmitri Tymoczko's theories of harmonic geometry to illustrate the inversional symmetry of an added-sixth tonic triad (e.g., C–E–G–A), argues for the stability of such sonorities (so that they can be prolonged in a quasi-Schenkerian

[47] Benedict Taylor, "Modal Four-Note Pitch Collections in the Music of Dvořák's American Period," *Music Theory Spectrum* 32, no. 1 (Spring 2010), 44–59.

sense), and shows how ***PLR*** transformations can be adjusted for four-note sets; see Example 2–22 for his illustration of ***P´*** and ***R´***.

Example 2–22. After Taylor's Example 15.



For Taylor, ***P´*** changes the mode of a triad and the top note ascends or descends a semitone.

R´ changes the "root" of a four-note sonority but not the pitch-class content.

With regard to this last point, such adjustments are complementary to my own discussions elsewhere in this study for other types of seventh chords, especially the modified SLIDE function and the ***PR***–omnibus connection. As for ***R´***, the "transformation" toggles between what Taylor terms the Aeolian and pentatonic four-note sets; a "modulation" between the two sets is then trivial. We might say that the ease with which Dvořák moves between relative keys—a felicitousness for which he is often compared to Schubert—is aided and intensified by the inclusion of such a fourth note to the triadic set. Taylor also shows how Dvořák is able to smoothly transition between large-scale key areas in the Ninth Symphony via linked ***P´*** and ***R´*** transformations; in spite of the ubiquity of such four-note sets, the music is not fully modal. Rather, many parts of the Ninth Symphony are tokens of Biamonte's category of modal harmony, or at the very least, they are modally inflected.

Pentatonicism.

David Beveridge has demonstrated that there are clear pentatonic elements in Dvořák's melodic and harmonic style as early as the first String Quartet, op. 2 (1862); he goes on to say that no composer before Debussy used pentatonicism so conspicuously as Dvořák did, especially in the American works. In this manner, Dvořák was a pioneer in the expressive use of pentatonicism, often as a token of some sort of folk-song based nationalism.[48] Beveridge writes: "Indeed it must be admitted that other Romantic composers also explored pentatonicism. But few of them did so fully as Dvořák."[49] Indeed, an analysis of the Largo of the "New World" Symphony forms a major portion of Jeremy Day-O'Connell's exploration of the intersection of a pentatonic pitch-space with the use of $\hat{6}$ as a leading-tone substitute; this analysis will be discussed in more depth below in the section "Enriched Cadential Function" (see p. 116ff).[50]

In many important ways, this section and the prior one on modality are intimately linked. Indeed, when Dvořák emphasizes the pentatonic aspects of a melody, it often entails leaps from/to scale degrees $\hat{2}$ and/or $\hat{6}$; Example 1–14 in the last chapter would be a modal melody according to Biamonte's definition. When such a melody is harmonized by secondary triads (such as ii or iii in major or ♭VII in minor, etc.), it will satisfy one of Biamonte's criteria for modal classification. To be sure, ♭VII, the quintessential harmony of the Aeolian and/or Mixolydian modes, can express the subtonic chord that is characteristic of the anhemitonic minor pentatonic scale.

---

[48] Beveridge, *Romantic Ideas in a Classical Frame,* 25, and also "Sophisticated Primitivism: the Significance of Pentatonicism in Dvořák's *American* Quartet," *Current Musicology* 24 (1977), 25–36, in which Beveridge thoroughly analyzes the pentatonic aspects of the String Quartet in F Major, op. 96.

[49] Beveridge, *Romantic Ideas in a Classical Frame*, 25

[50] See Jeremy Day O'Connell, "The Rise of $\hat{6}$ in Nineteenth Century Music," *Music Theory Spectrum* 24, no. 1 (Spring 2002), 35–67.

Pentatonicism can also be strongly evocative of a pastoral topic. The horn fifths of Example 1–11, a typical pastoral token, are an important subset of the pentatonic scale. Recurring $\hat{6}$–$\hat{5}$ motion in the melody or accompaniment is also a strong signifier for the pastoral topic. In the most common form of the pentatonic scale, the dyad formed by $\hat{6}$ and $\hat{5}$ is somewhat isolated by a gap from the other three notes.[51] Dvořák utilizes both horn fifths and the $\hat{6}$–$\hat{5}$ dyad to set up the pastoral/sylvan content of *The Golden Spinning Wheel*, op. 109 (1896), by sustaining an arpeggiated added-sixth tonic for the first thirty-six measures as an accompaniment for horn fifths (which here are actually played by horns).[52]

Day-O'Connell also points out the religious significance of $\hat{6}$—especially when it resolves as a $\hat{6}$–$\hat{8}$ plagal motion—and the hybridization of nature and religion topics, which would have been ideologically appealing to nineteenth-century audience accustomed to equating Nature with the spiritual/sublime. Certainly, we should be sensitive to the possibility of pentatonic religious reference in Dvořák's music, especially given that he was a devout Roman Catholic (though we must also be conscious not to fall into the trap of biography-based analyses). It is essential that the analyst recall the various roles that pentatonicism can play in Dvořák's music—nationalistic totem and/or aura of folk song, pastoral signifier, religious evocation—if attempting to construct a narrative account of one of Dvořák's works.

[51] On the possibility of the gap being construed as a kind of large step, see Beveridge, "Sophisticated Primitivism," 30, and Day-O'Connell, 41–42 and 52–55, including his Example 35.
[52] There are, however, military topics in play as well, which complicate a reading of this opening as purely pastoral.

Diatonic sonorities through voice leading.

We have already examined above the ways in which Dvořák created original sonorities through chromatic voice leading. Distinct from these methods, Robert Fertitta draws considerable attention to the various ways in which Dvořák creates unique sonorities or textures without resorting to chromatic effects.[53] For instance, he points to the fourth movement of the String Quartet in G Major, op. 106 (1895), for contrapuntal motion that results in diatonic dissonances (Example 2–23a). Example 2–23b shows the characteristic sonority of the raised $\hat{6}$ added to a cadential six-four in the Symphony no. 5 in F major, op. 76 (1875). Likewise, a decoration of the dominant from the first movement of the "New World" Symphony can be seen in Example 2–23c. Other accumulations of notes above the dominant can be seen in Examples 2–15, 2–24, and 2–27b, and they are readily found throughout Dvořák's output. As I discuss below on pp. 141–43, such accumulations are a consistent feature of his mature style.

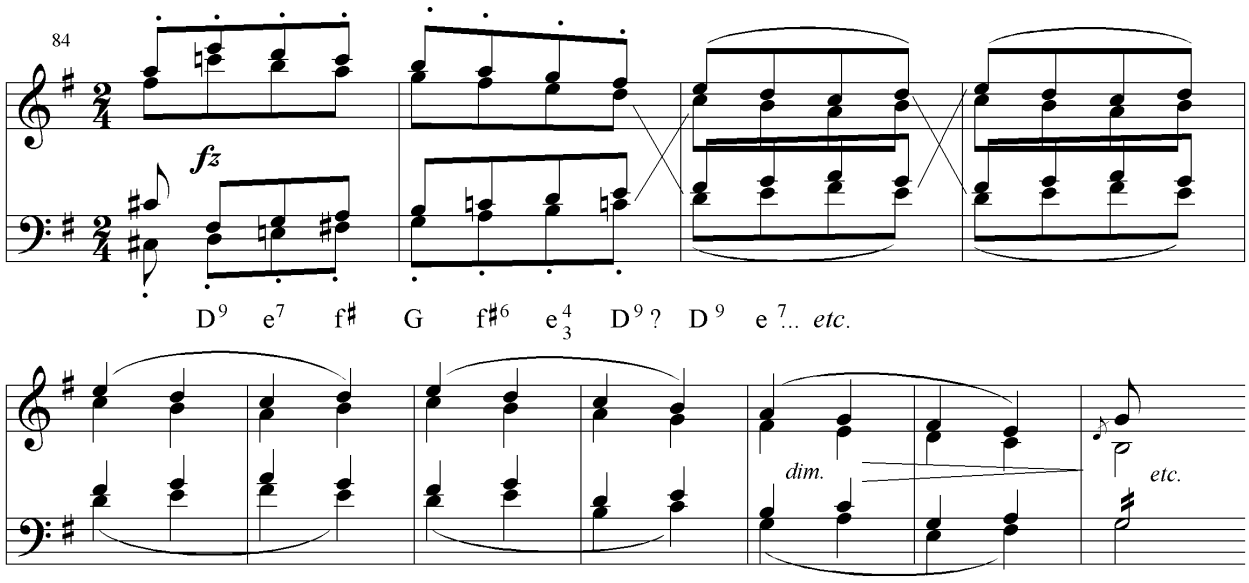
With regard to the accumulation of notes above the dominant, sometimes the voice leading will give the impression of the superimposition of triads. In m. 12 of the third Biblical Song, op. 99 (1894), there appears to be a C minor triad (vi) over a cadential six-four of E♭ major (i); see the boxed notes of Example 2–24. By the third beat, it seems that the IV chord is intermingling with the cadential dominant (which itself never actually achieves a root-position expression before resolving to the tonic in m. 13). In these types of cases, the apparent triads can often be explained via the traditional types of figuration (suspensions, accented passing motions, etc.), but, experientially, the impression of superimposition of triads is often strong enough to qualify their analysis as such (i.e., independent harmonic entities).

---

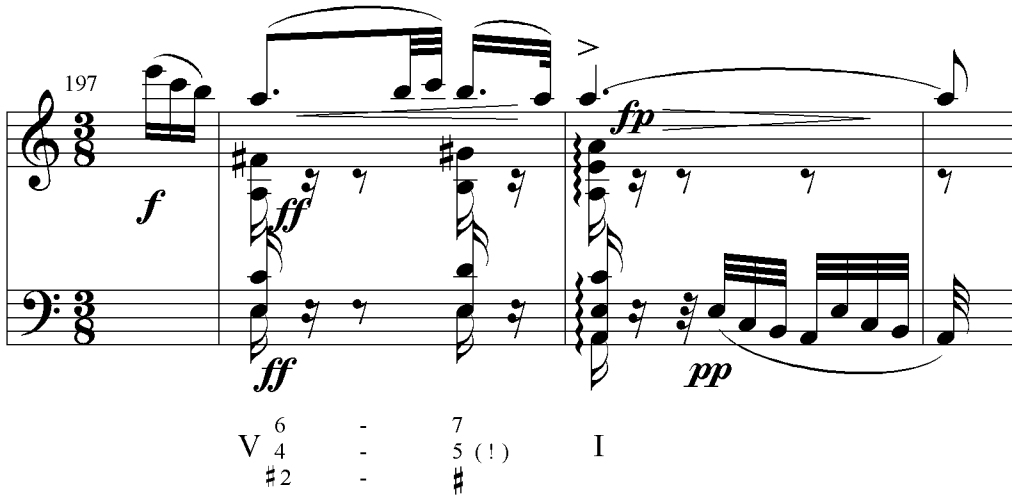
[53] See Robert Fertitta, *The Harmonic Vocabulary of Antonín Dvořák*, (Masters thesis, Queens College, New York City, 1976).

Example 2–23.

a. String Quartet in G Major, op. 106, iv, mm. 84–94. This diatonic wedge has dissonant, nonfunctional sonorities that are contrapuntally derived.

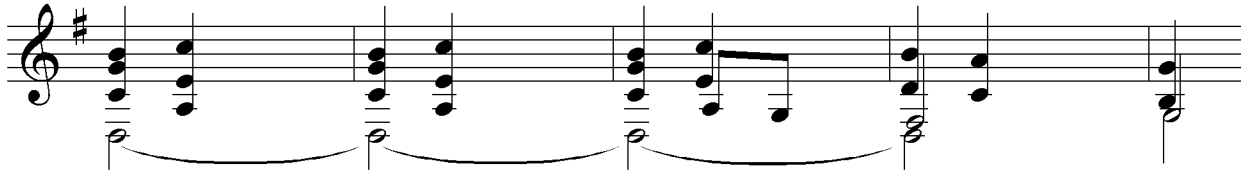


b. Fifth Symphony, op. 76, ii, mm. 197–200. Raised $\hat{6}$ added to the cadenital six-four. Note the irregular resolution of the fourth in order to avoid a doubled leading tone.

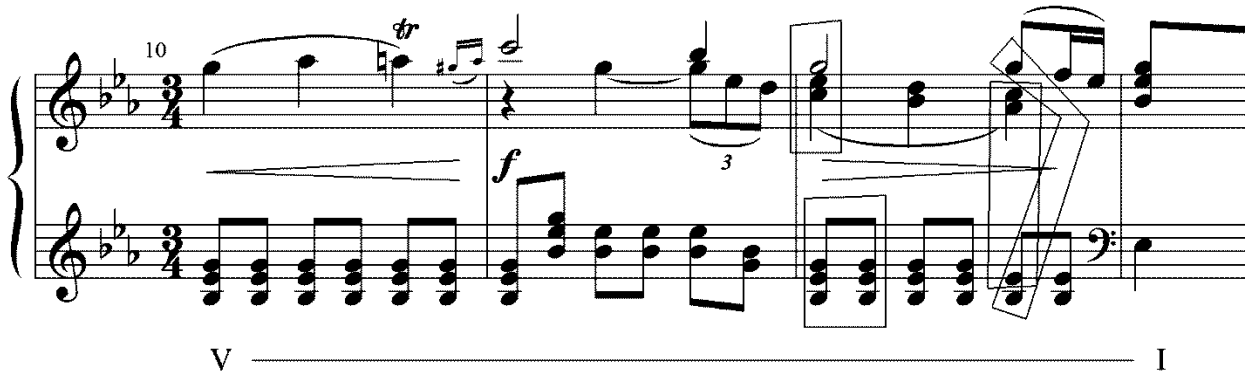


Example 2–23. continued.

c. Ninth Symphony, i, mm. 145–49. Neighboring motion decorates and extends the dominant 4–3 suspension.



Example 2–24. Biblical Songs, op. 99, no. 3, mm.10–13. Possible interpretation as superposition of triads.



Finally, a word about unresolved sevenths: as observed by Taylor, sevenths are often part of a quasi-fundamental harmony and the whole is treated as a stable unit. As such, they often do not resolve according to Classical norms of voice leading.[54] The beginning of the String Quartet in E♭ Major, op. 51 (1878–79), shown in Example 2–25a, illustrates how the addition of the leading tone to the tonic chord (at the asterisk) can create a characteristic sonority that

[54] See Beveridge, 73, for a more general discussion of Dvořák's use of unresolved dissonances, especially in works written as early as 1865.

contemporary audiences, expecting a nationalistic work—it was commissioned to be of a Slavonic nature—would probably have heard as a "Czechism." I discuss this piece in more detail in several different places; see pp. 114–16, 205–208, and 251–56. The next examples show how a coloristic, non-resolving seventh is incorporated in the scherzo of the Ninth Symphony. Example 2–25b is motivically related to a similar figure in the first movement (see Example 2–25c—although in this case the seventh *is* prepared and resolved at a slightly deeper level).[55] Incidentally, many, but not all, contemporaneous commentators saw this seventh as Dvořák's use of an indigenous "American" element rather than a "Czechism" (as it was in the String Quartet in E♭ Major) giving credence to the hypothesis that nationalism in music is partially dictated by the expectations of the audience.

We have seen how Dvořák was able to harness the power of modality and pentatonicism as elements of his musical aesthetic, often to a degree not attempted by most other nineteenth-century composers. Through the use of diatonic voice-leading, he was able to create original, intelligible sonorities without the use of chromaticism. This last point is important as it means that even passages of music in Dvořák's seemingly unaffected "simple" style remain interesting, resisting characterization as derivative, banal, or kitschy.[56] The expansion of diatonic means in the music of Dvořák, Brahms, and other late nineteenth-century, "Classically oriented"

---

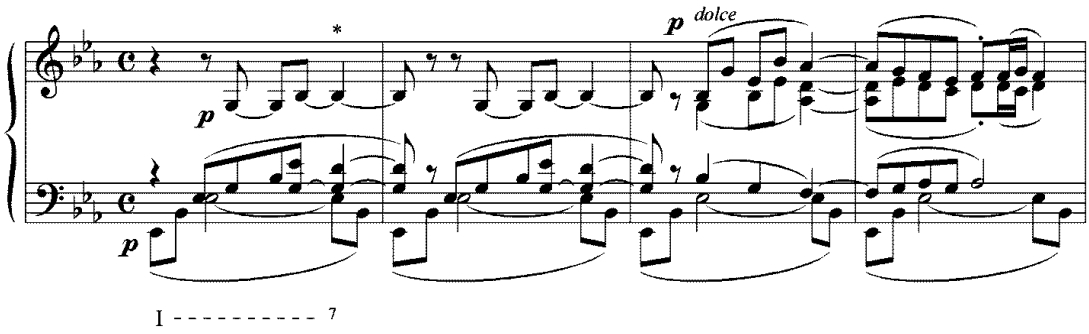
[55] It is possible to hear the D as a kind of stable pedal tone here, but the fact remains that the seventh creates a dissonance *of some kind*, which is made explicit or at least more intense when the D appears as a fourth above A. Dvořák very often uses a second-inversion dominant seventh (instead of a supertonic chord) to harmonize the melodic progression $\hat{2}$–$\hat{5}$–$\hat{1}$ in the bass

[56] See Beckerman's arguments in "The Master's Little Joke: Antonín Dvořák and the Mask of the Nation," in *Dvořák and His World* , ed. Michael Beckerman (Princeton: Princeton University Press, 1993), 134–56, for a discussion of the calculation and premeditation with which Dvořák cultivated his reputation as a *musikant* and that even simple passages of music were probably consciously composed this way to create a specific effect.

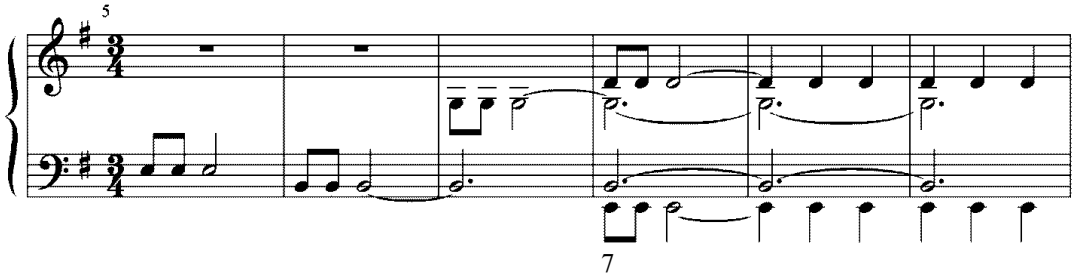
composers was one way through which they resisted and balanced the chromaticizing impulses of the New German school.[57]

Example 2–25. Instances of unresolved (or seemingly unresolved) sevenths.

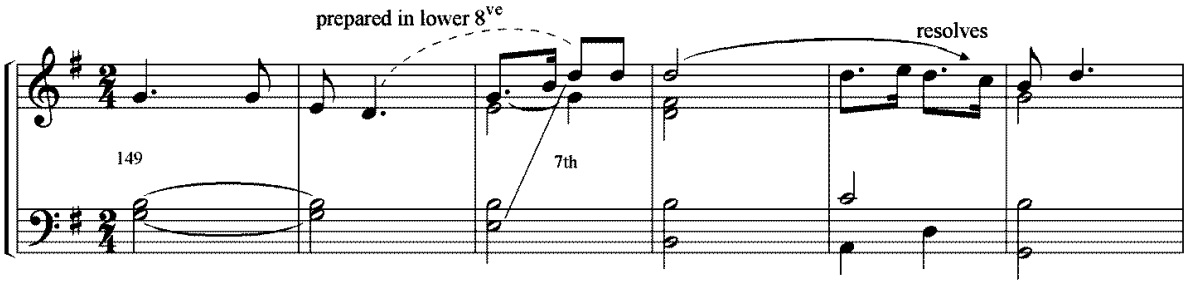
a. String Quartet in E♭ Major, op. 51 (1878–79), i, mm. 1–4.



b. Ninth Symphony, iii, mm. 5–10.



c. Ninth Symphony, i, mm. 149–54.



[57] I should clarify that Berlioz and Liszt were more interested than Wagner in diatonic modality, especially in their religious choral works. Thus, the seeds of the impulse which resists promiscuous chromaticism are partially sown in a small corner of the larger, and often much more chromatic, "New German" field.

We can see Dahlhaus's bias in favor of Wagner's music when he writes that "if Wagner was the dominant, so to speak 'official,' music of the second half of the nineteenth century—and the most partisan adherents of Brahms, those who regarded Wagner's later works as a dreadful omen for the future of music, did not deny that they were a phenomenon overshadowing everything else—at the same time, and not by chance, 'unofficial,' 'trivial' music evolved to become a musico-pyschological force such as it had not been before."[58] Dahlhaus's use of the qualifier "if" casts the sentence in a speculative light, but, really, in the context of his argument, there is a strong suggestion that Dahlhaus believes that the story of Wagner's music is the same story that determines the arc of late nineteenth-century musical thought (a narrative that implicitly relegates Dvořák's music to his latter category of "unofficial, trivial" music).

As discussed in the last chapter, Dvořák was a great admirer of Wagner and heavily influenced by him, but I hope that the examples from this last section have shown that he was not completely in his thrall. The enriched diatonic means by which Dvořák crafted large swaths of musical material attest to this, as well as, contra Dahlhaus, the reality that there were other viable, late nineteenth-century *neue Bahnen* that did not blindly follow those already trod by the New Germans.

[58] Dahlhaus, *Between Romanticism and Modernism,* 11.

III. Enriched Cadential Function

For this section, I would like to explore the ways in which Dvořák participated in the late nineteenth-century expansion of cadential procedures beyond those of Classical and early Romantic practice. On the one hand, he experimented with the expansion of the plagal domain that characterizes so much of the post-1850 repertoire. On the other hand, he continued to explore fresh possibilities within authentic cadential practice.

With respect to the plagal realm, Dvořák was both an imitator and an innovator. For example, although he was the recipient of certain established plagal devices of the mid-1800s, such as the use of $\flat\hat{2}$ as a pre-tonic element, in other areas he found creative new uses for subdominant-functioned elements. Apt instantiation of the latter can be found in Dvořák's persistent use of the pentatonic $\hat{6}$–$\hat{8}$ cadence in the Largo of the "New World" Symphony. As Jeremy Day-O'Connell has noted, this subdominant-grounded cadence contains important formal implications; especially as it seems to supplant the role of the authentic cadence.[59] Other examples of plagal cadential action will be dealt with below.

With respect to the authentic realm, Dvořák's most pioneering work involved subtonic $\hat{7}$; he elevated it to a much more prominent role as a cadential agent, according to Daniel Harrison's definition of the term. This is especially true for the late symphonies and tone poems. We have already discussed subtonic $\hat{7}$ in its modal roles above, but Dvořák's implementation of the subtonic at cadences, themselves traditionally the most stable and conservative elements of even late nineteenth-century music, is particularly salient: the encroachment by subtonic $\hat{7}$ on what

[59] Day-O'Connell, "The Rise of $\hat{6}$ in Nineteenth Century Music," See pp. 123–26 below for my discussion of his interpretation of this movement.

had once been solely the domain of the leading tone is maybe the most *un*-Classical armament in Dvořák's nineteenth-century harmonic arsenal (and certainly one of the features of his music that contemporary critics considered nationalistic). Related, but tangential to his use of subtonic $\hat{7}$, is Dvořák's method of creating novel chords above $\hat{5}$.

We have several interconnected issues to discuss, then, that I will deal with in the following order:

1) The use of $\flat\hat{2}$ at the cadence, mostly as it pertains to the plagal implication of the note.

2) The $\hat{6}$–$\hat{8}$ cadence.

3) Passages in Dvořák's music that seems to illustrate plagal expansion in some way.

4) The use of subtonic $\hat{7}$ as a cadential agent.

5) Accumulations of notes above $\hat{5}$.

Numbers 1–3 are concerned with plagal devices at various degrees of strength, whereas numbers 4–5 is deal with the expansion of authentic cadential procedures.

The role of $\flat\hat{2}$ at the cadence.

The broadening acceptance of a downward leading tone to the tonic in the later 1800s was concomitant with the expansion of the plagal domain, the rising use of semitonal voice-leading, and also, I think, a reawakening of modal awareness: increasing interest in inversional

symmetry led to a renewal of interest in the Phrygian mode as a dualistic counterpart to the major scale. By downward leading tone, I mean the $\flat\hat{2}$ descending to the tonic; this is a distinctly different use of the term than that of the harmonic dualists of the mid to late 1800s, such as Hauptmann and Oettingen, who considered a "downward leading tone" a motion from $\hat{6}$ to $\hat{5}$ in the minor mode. Increasingly, pieces in the Romantic era began to close with prominent $\flat\hat{2}$–$\hat{1}$ motion, in the melody and/or the bass. The *locus classicus* of this technique can be found at the end of the finale of Schubert's Quintet in C Major, D. 956 (1828), in which the final cadential $\flat\hat{2}$ is a sort of synecdoche for more traditional post-cadential plagal coloration. The pre-tonic use of $\flat\hat{2}$ may express subdominant or dominant function. For the latter, Charles Smith states that $\hat{2}$ is the dominant constituent that is altered first, since it is "the least crucial of the normal members of any dominant chord."[60] Yet some theorists derive $\flat\hat{2}$ from the subdominant region (as in Schoenberg's theories). The musical context of $\flat\hat{2}$ will usually tell us whether it is dominant-derived or subdominant-derived.

In Schubert's practice, the downward leading tone, $\flat\hat{2}$, was most often accompanied by the leading tone proper, yielding an augmented sixth chord of some kind. This type of use of the augmented sixth was theoretically reified in Tchaikovsky's harmony text (1871), which shows the normative resolution of an augmented-sixth chord built above $\flat\hat{2}$ directly to the tonic.[61] Further, as we saw above in Cyrill Kistler's "stretched" form of the C-minor scale (Example 2–

---

[60] Charles Smith, "The Functional Extravagance of Chromatic Chords." *Music Theory Spectrum* 8 (Spring 1986), 94–139, esp. p. 124 for this discussion. A similar treatment can be found in Harrison's *Harmonic Function in Chromatic Music*, where he sees the fifth of any chord as an "associate" (i.e., participating the least in chordal identity, as opposed to "agent" or "base;" see pp. 213–215 below for an application of Harrison's theory.

[61] Tchaikovksy, Peter Ilyich. *Guide to the Practical Study of Harmony*, trans. from the German version of P. Juon by Emil Krall and Jame Liebling (Canoga Park, CA: Summit Publishing Company, l970), 106–7.

2), the augmented sixth A♭–F♯ which applies itself to the dominant has an analog in the other augmented sixth present in the system, D♭–B♮, which applies itself directly to the tonic.

Rather than hearing a ♭$\hat{2}$-based augmented-sixth chord as some sort of pre-dominant elaboration, then, we might hear it instead more or less as a substitute for a normative V^4_3 or vii^{o6}_5 —this is sometimes referred to as a *tritone substitution* for the dominant; its function depends on the chord of resolution.[62] Using Harrison's scale-degree function terminology, we could imagine the tonic-resolving augmented-sixth chord as a mixed-function chord with mostly dominant function but an important coloration of subdominant discharge.

Another use of ♭$\hat{2}$ is as the root of a post-cadential ♭II as a replacement for the subdominant chord, or its close relative, the tonic-resolving ii^6_5 (alternatively conceived as IV^{+6}). Chopin's Nocturne, op. 27, no. 1, is a good example of this. Dvořák's appropriation of this technique can found in the Piano Trio in E Minor, "Dumky," op. 90, and the Terzetto, op. 74; both prominently feature a cadential motion from D♭–C over a tonic pedal (see Example 2–26). In both cases, an unambiguous authentic cadence has already been sounded but Dvořák has transformed the stereotypical tonic-resolving ii^6_5 of an earlier phase of Romanticism to a tonic-resolving $♭II^4_2$ for a more pungent harmonic effect.

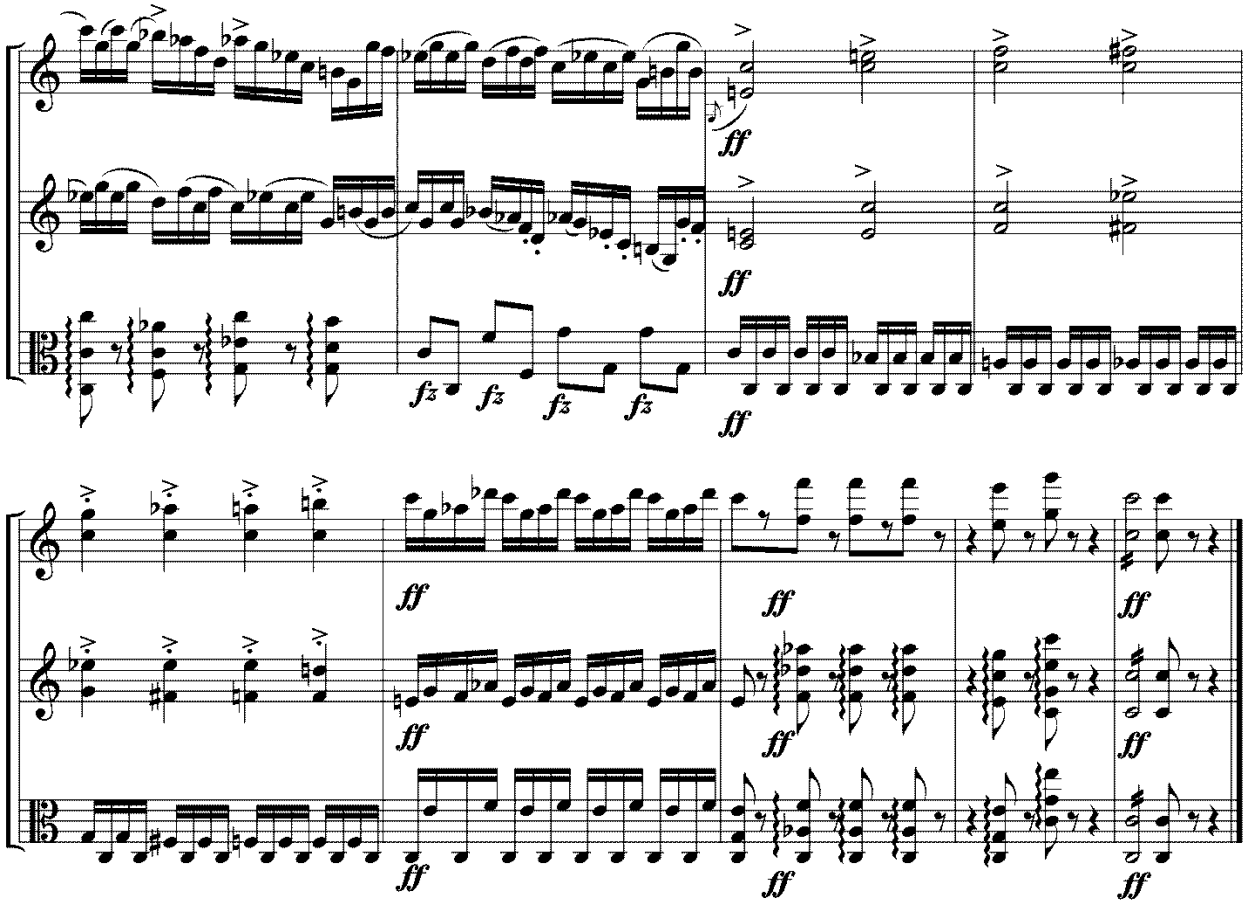
A further use of ♭$\hat{2}$ is to secure a tonic close without recourse to prior authentic cadential confirmation. The Scherzo of Brahms's Piano Quintet in F Minor, op. 34 (1864), contains a striking emphasis on D♭–C (in a movement tonally centered on C) in the final twenty measures,

[62] To this end, Harrison shows that Gottfried Weber considered what we call a German augmented-sixth chord to be a rootless altered V^9 or a II^9 depending on whether the following chord was a tonic or dominant (Harrison, "Supplement to the Theory of Augmented-Sixth Chords," 180), although Weber shows very few practical examples of the dominant-functioned augmented sixth chord. What we call a French augmented sixth chord is very easily perceived as an altered second-inversion dominant seventh.

which, although perfectly self-contained as a cadential gesture in the movement, anticipates the final movement's F minor, retrospectively suggesting the reading of the downward leading tone as $\hat{6}$–$\hat{5}$ in the key of both outer-movements. As in Schubert's usage, shown above, Brahms occasionally harmonizes $\flat\hat{2}$ with the leading tone, but, unlike Schubert, he avoids a clear authentic cadence before the expanded plagal close (unless the entirety of the final duple-meter section is considered post-cadential).

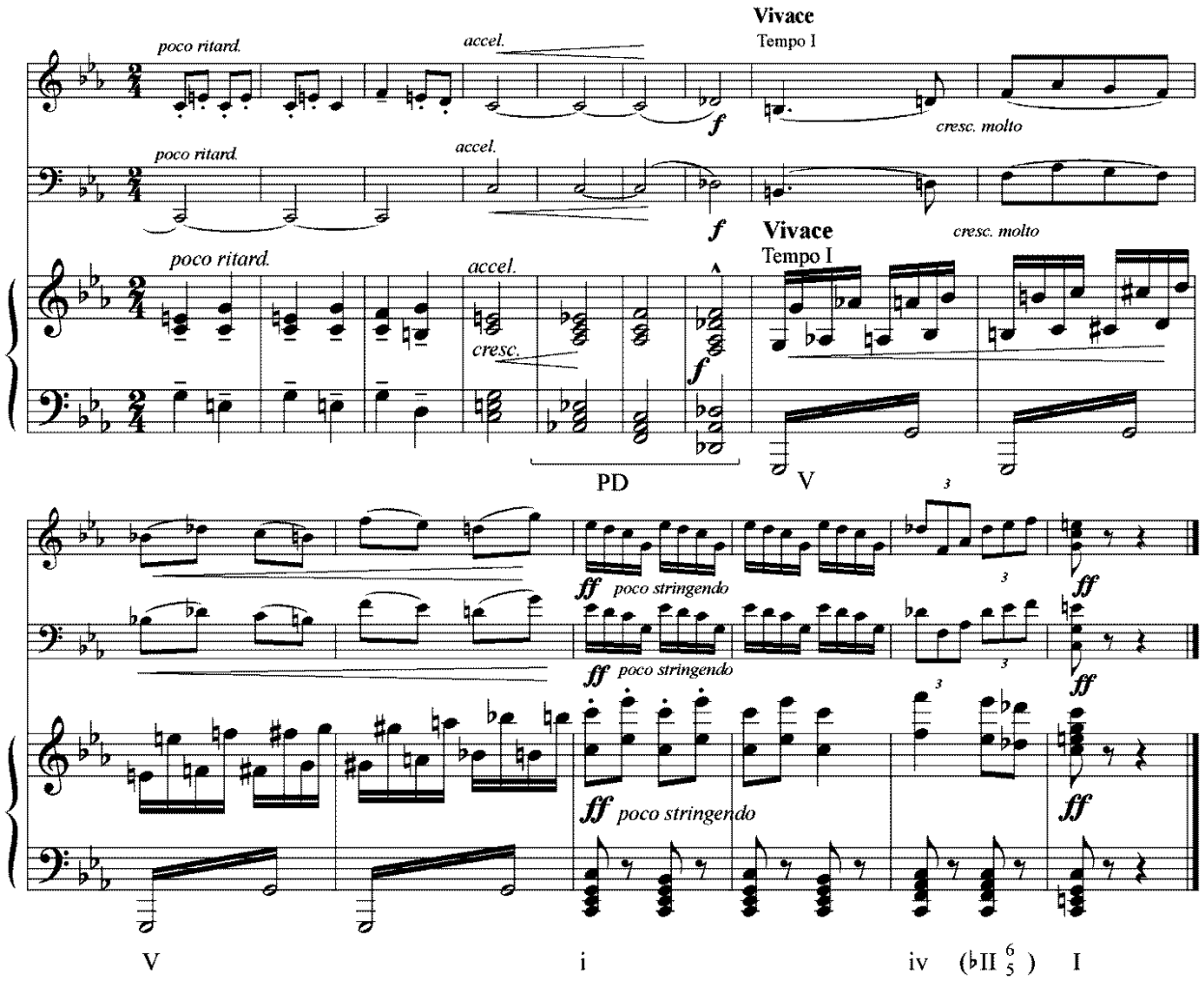
Example 2–26.

a. Terzetto, op. 74, iv, last 9 mm, features $\flat\hat{2}$ at the cadence.



Example 2–26. continued.

b. Dumky Trio, op. 90, vi, final 15mm features ♭$\hat{2}$ at the cadence.



As we have seen, during the course of the 1800s, the involvement of ♭$\hat{2}$ at cadences evolved away from Classical practice in several ways: 1) ♭$\hat{2}$ could evince dominant function, replacing the true dominant chord with another, such as a ♭$\hat{2}$-based tonic-resolving augmented-sixth chord (tritone substitution); 2) it could supplant the traditional role of the subdominant in a post-cadential plagal resolution; or 3) it could represent a manifestation of the expanding plagal

domain, such as when a Neapolitan chord resolved directly to the tonic without a prior authentic cadence.

With regard to the first case, providing the leading tone with a striking, non-Classical harmonization is one way nineteenth-century composers helped destroy the hegemony of the traditional cadential dominant. With regard to the second and third cases, the former seems to presage the latter, although we find instances of both usages in the late 1800s, as shown by examples from both Brahms and Dvořák.

The $\hat{6}$–$\hat{8}$ cadence.

Over the course of the later nineteenth century, the leading tone relinquished some of its cadential power to two other tones that also had the capacity for melodic closure, namely the submediant (almost always the major-mode $\hat{6}$) and the subtonic. These two tones have a venerable cadential pedigree: they are integral in modal cadences in monophonic and polyphonic repertoire from the Middle Ages and Renaissance; they are also present in folk music, especially that of Eastern Europe, which often contained the subtonic and/or $\hat{6}$ as a cadential agent.[63] I will discuss the role of the subtonic $\hat{7}$ in detail below.

Along with a rise in the importance of the plagal domain in the mid to late 1800s, $\hat{6}$ increasingly became a viable substitute for the leading tone, despite its historical precedent as an

[63] During the course of the fourteenth century and after, however, the notated *subtonum* was often raised to a *subsemitonum* via the practice of *music ficta*, especially in polyphonic repertoire.

adjunct to the dominant scale-degree.[64] In fact, Jeremy Day-O'Connell sees a cadential motion from $\hat{6}$ to $\hat{8}$ as a quintessentially nineteenth-century device, originating with Berlioz, as instantiated in the *Symphonie fantastique* (1830). As symptomatic of the increased use of the pentatonic scale during this period, Day-O'Connell sees $\hat{6}$–$\hat{8}$ as a "step" in a pentatonic-scalar space; he gives many examples of the phenomenon from a broad swath of nineteenth-century literature. Day-O'Connell also claims, rightly, that the rising third motion of the $\hat{6}$–$\hat{8}$ cadence unambiguously defines a plagal cadence the way a $\hat{7}$–$\hat{8}$ motion defines an authentic cadence, and that the $\hat{6}$–$\hat{8}$ cadence further allows the use of ii and ii^7 as pre-tonic chords since the parallel fifths between $\hat{2}$–$\hat{6}$ and $\hat{1}$–$\hat{5}$ can be avoided (although this may be something of a moot point, since with the general relaxation of the rules of harmonic progression there was a concomitant relaxation of many voice-leading rules). This salient, cadential use of the supertonic chord could also be conceived as being a manifestation of a kind of modal harmony (see Biamonte's fourth category above, which discusses the elevation of secondary triads and the concomitant subversion of traditional tonal function).

Examples taken from the Largo of Dvořák's "New World" Symphony form an important part of Day-O'Connell's argument vis-à-vis the possibility of a "structural" plagal cadence arising in the latter 1800s. Quoting Schoenberg's dismissal of plagal cadences and acknowledging the concept of a structural plagal cadence as "patently heterodox," Day-O'Connell goes on to show the evolution of a recurring cadential figure in the Largo.[65]

---

[64] As it is in a dominant-ninth chord, where it functions as an upper neighbor to the dominant. Day-O'Connell says, notably, that the submediant scale degree becomes "a surrogate leading tone for the 'plagalists' of the nineteenth century." See Day-O'Connell, 57–58.

[65] See Day-O'Connell, 61–63.

Early in the movement, ii^6_5 is used in a traditionally classical pre-dominant fashion (although this ii^6_5 is itself preceded by a characteristically nineteenth-century sonority: the unadorned "augmented triad" arising through a passing motion but treated as an entity in and of itself—see the asterisk in Example 2–27a which is taken from Example 48 of Day-O'Connell's article). As the movement progresses, however, ii^6_5 becomes ever more emancipated from its traditional role, from post-authentic cadential confirmation (Example 2–27b) to ultimate closure of formal sections without recourse to the dominant at all (Example 2–27c and d). Day-O'Connell points to the use of the leading tone in m. 114 as perhaps a candidate for authentic closure (using Harrison's terminology of "dominant discharge"), probably as a hedge against criticism from those who are uncomfortable with the concept of a structural plagal cadence.

I would augment his alternate reading in favor of plagal closure by pointing out that the bass still expresses the $\hat{4}$–$\hat{1}$ progression that both Harrison and Kevin Swinden find characteristic of subdominant function (in this case, Swinden would symbolize the vii^{o4}_3 with "$\boldsymbol{S^D}$," meaning a functionally mixed subdominant chord but with dominant coloring).[66]

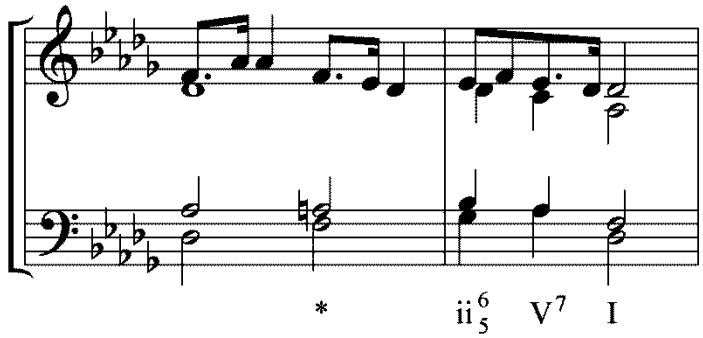
At the immediately local level, Dvořák's pre-tonic use of ii and ii^7 seem to be a major-mode analog to the pre-tonic use of triads and seventh chords built on the Neapolitan scale degree, as was discussed in the prior section. The bigger picture here, however, is the tonal organization of the movement along a plagal "axis;" In the Largo, ii and ii^7 are structural

[66] Harrison, *Harmonic Function in Chromatic Music*, 66–71**,** discusses the mixed function of vii^{o7}, stating that most often its function is indeed dominant, but that in the case of vii^{o4}_3–I its subdominant elements can override those of the dominant. See also Kevin Swinden, "When Functions Collide: Aspects of Plural Function in Chromatic Music," *Music Theory Spectrum* 27, no. 2 (Autumn 2005), 249–82; Swinden also finds the bass progression $\hat{4}$–$\hat{1}$ to be completely characteristic of subdominant function, and, as such, more strongly indicative of subdominant function even where conflicts arise with upper-voice dominant agents (see especially his discussion on pp. 259–64).

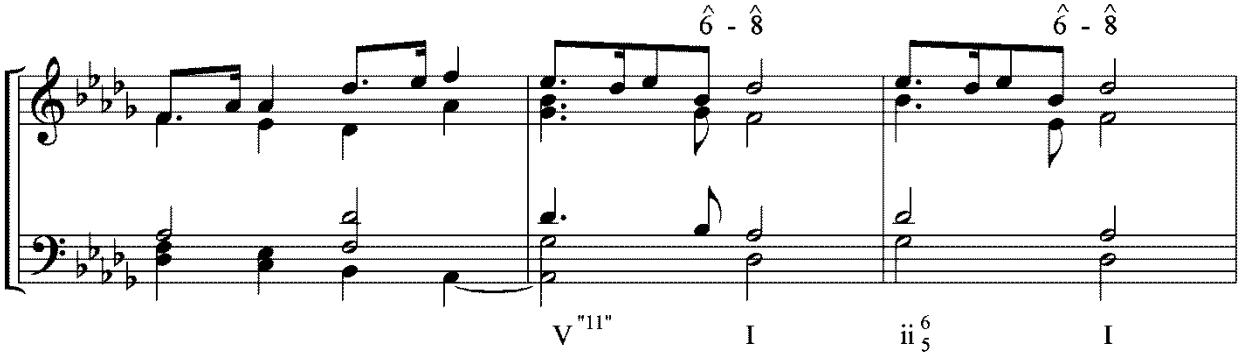
elements in a way that the $\flat II^4_2$ post-cadential plagal inflections of the "Dumky" Trio and Terzetto are not.

Example 2–27. Largo from Dvořák's Ninth Symphony, "New World," (after Day-O'Connell's Example 48).

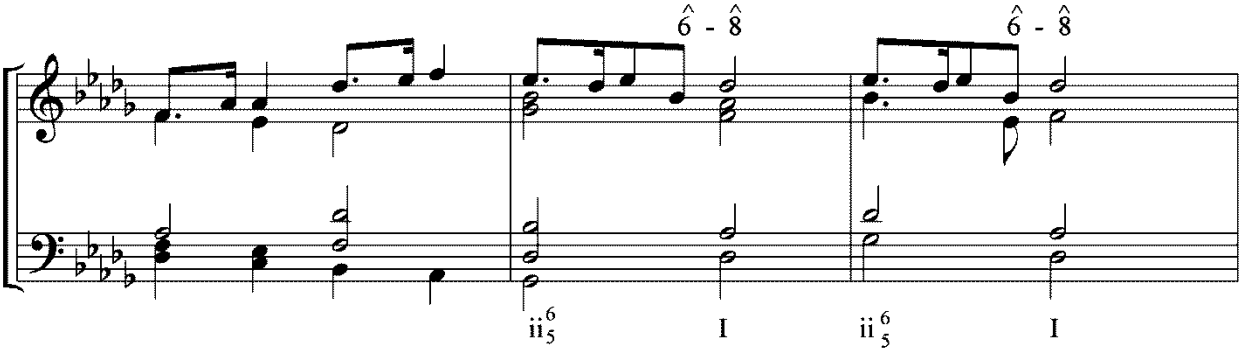
a. Cadence of the first period (mm. 9–10).



b. Cadence of the first paragraph (mm. 17–19).

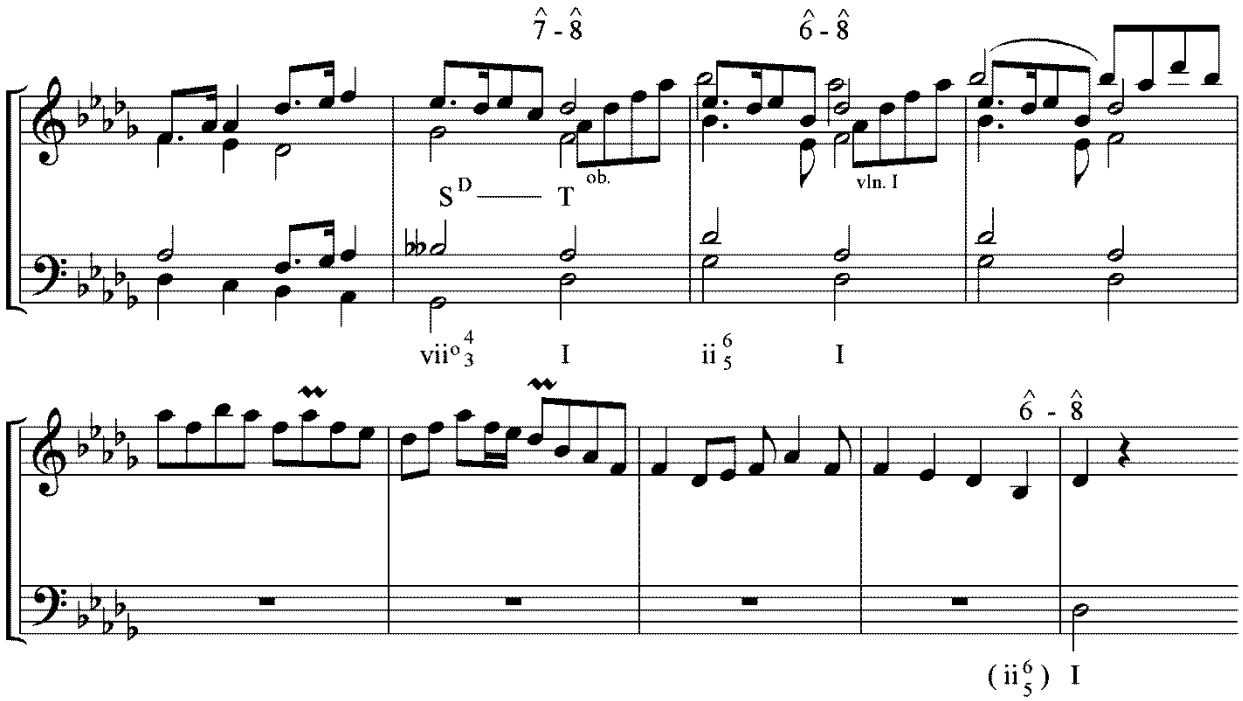


c) Cadence of the entire A section (mm. 34–40).



Example 2–27. continued.

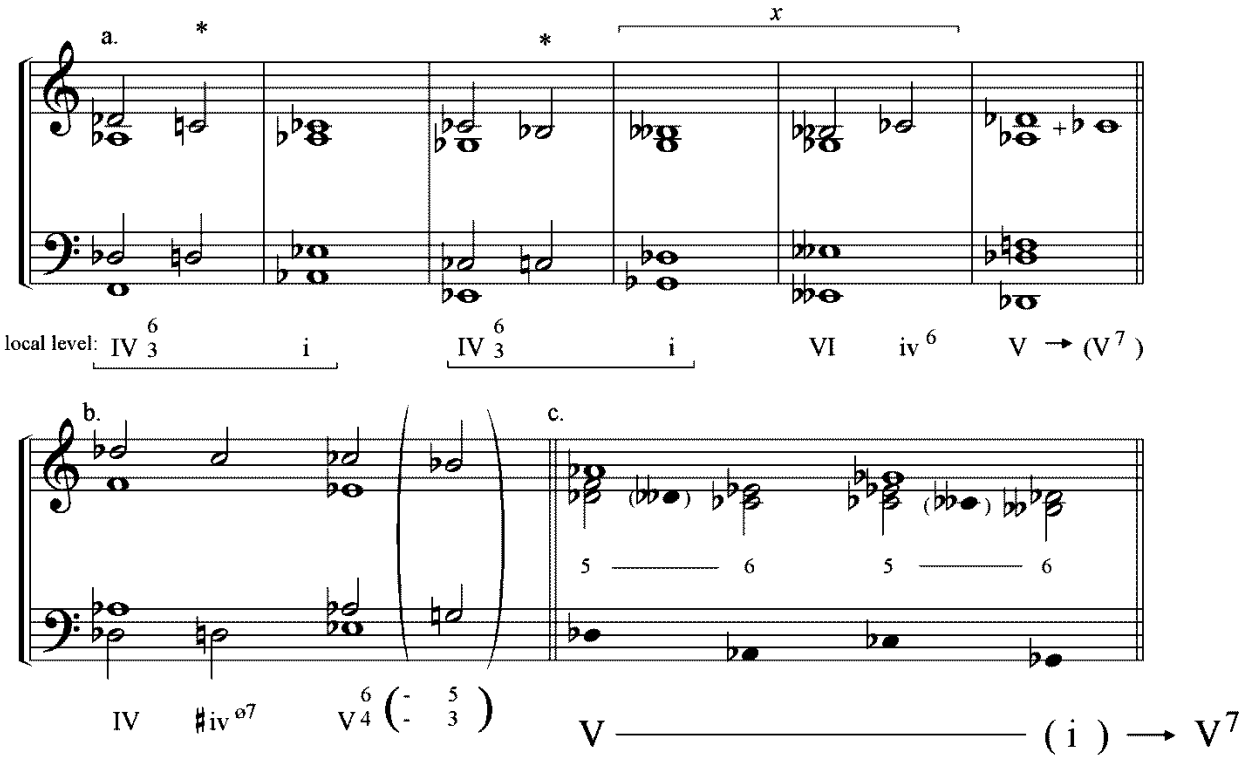
d. Final cadences (mm. 113–21).



Other plagal cadential functions.

Not all types of plagal expansion can be linked to the two techniques explained above. We will explore two such examples in the following pages. For the example from *Rusalka* (Example 2–28), surface-level plagal resolutions decorate a chromatic expansion of the large-scale dominant. The opening cadential gesture from the Trio of the String Quartet in C Major, op. 61, is another type of plagal expansion altogether and is emblematic of the Romantic quest for new types of tonal organization. As with any analysis of late nineteenth-century music, sensitivity to various plagal gestures is important since they play off the received tradition of preference for authentic cadences and the authentic-axis of tonal organization.

Example 2–28. *Rusalka*, harmonic preparation immediately preceding "Song to the Moon." It begins with local IV^6–i plagal motions and ends with a Phrygian half cadence.



The passage quoted in Example 2–28a is the chord progression that sets up the introductory dominant-seventh chord for Rusalka's famous "Song to the Moon" in Act I of *Rusalka*. It showcases both a modal sensibility and an interesting use of chromatic voice leading to expand the cadence; I have enharmonically spelled the two measures bracketed by *x* to aid in the analysis. As a whole, the passage unfolds the transformation of a first-inversion D♭ major triad to its root position dominant seventh analog. The use of local IV^6–i plagal resolutions highlights the Dorian mode (and calls to mind Day-O'Connell's theories of the $\hat{6}$–$\hat{8}$ cadence, here in the bass), whereas the half cadence at the end of the passage is a rather conventional Phrygian half cadence. By using IV in first inversion, Dvořák avoided the cadential six-four

chord (Example 2–28b) that would have occurred if he were to have followed traditional voice leading procedures (as he often did). As we can see from Example 2–28c, the upper voice chromaticism decorates an underlying descending 5–6 sequence. The chromaticism is reminiscent of Wagner: semitonal voice-leading creates half-diminished seventh chords in the second half of the first and third measures (marked by asterisks in the example), and the terminal Phrygian half cadence, orchestrated with trombones and low woodwinds, recalls a similar cadence at the end of Wagner's Siegfried-as-Hero leitmotiv.[67] The purpose of this passage is to "descend" as it were to the tonic minor (spelled in the score as F♯ minor), after which, the onset of the aria has the effect of a Picardy third. By using chromaticism to highlight the tonic minor before the tonic major, Dvořák calls our attention to the role of the aria within the narrative of the opera's plot; a momentary vision of grace and tranquility set against the ultimately tragic outcome of the opera.

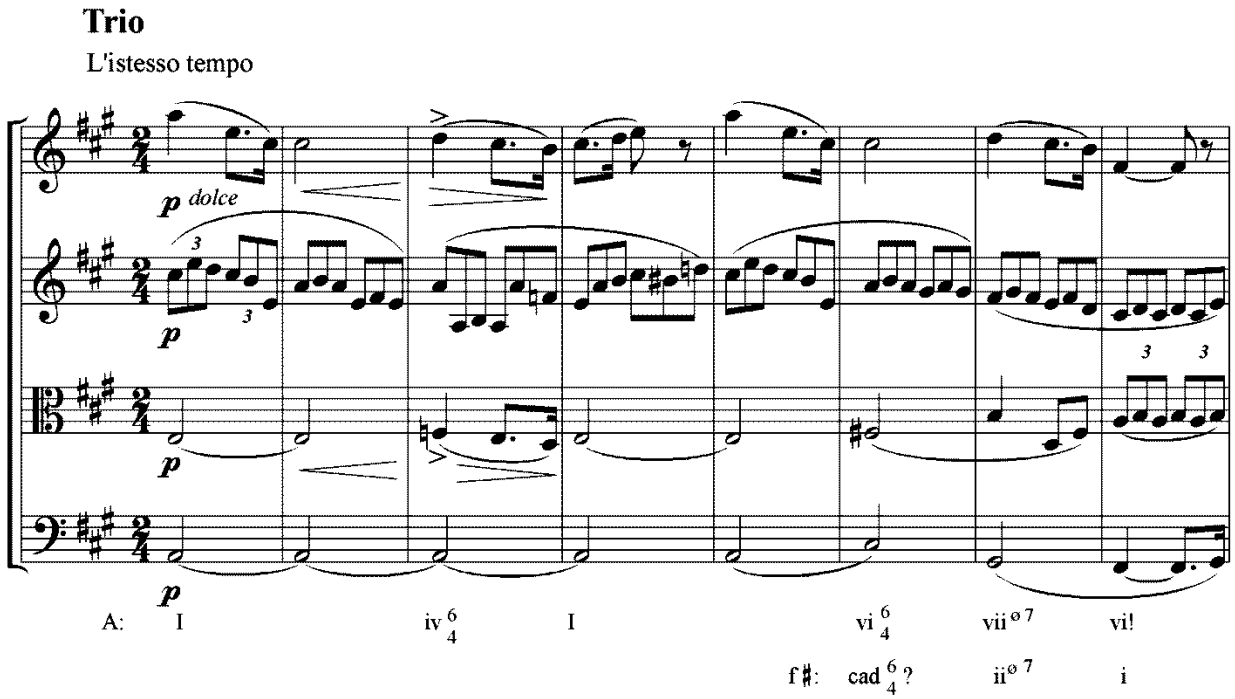
A second example of Dvořák's expansion of the plagal domain is harmonically quite striking. We have already encountered the trio of Dvořák's String Quartet in C Major, op. 61, with regard to its pervasive use of third-related harmonies, especially minor-third relations. The motion to F♯ minor at the end of the first phrase (Example 2–29) provides a motivic rational for the minor-third based progressions of the Trio; the opening melody hovers around C♯, a relatively clear example of what Leonard Meyer calls an axial melody; it only descends to F♯ at the last moment via a plagal inflection.[68]

Although it may be tempting to analyze the submediant arrival as a deceptive cadence, typical deceptive cadential rhetoric is absent here, making the move to vi all the more surprising

[67] Cf. Wotan's pronouncement at the end of Act III in *Die Walküre*.
[68] This concept is discussed in Leonard Meyer's *Style and Music: Theory, History, and Ideology* (Chicago: University of Chicago Press, 1996), pp. 234–45, especially with regard to the Romantic-era penchant for the mediant changing note schema, which is neatly instantiated by the melody presently under discussion.

(more deceptive?). That is, unlike a typical deceptive cadence, which usually uses an ascent to $\hat{6}$ in the bass to harmonize a melodic motion to the tonic, Dvořák's cadence uses the succesion vii^{ø7}–vi to harmonize a melodic drop from $\hat{2}$ to $\hat{6}$, which only retrospectively suggests a plagal cadence in F♯ minor (a hearing that is suggested by the unresolved F♯-minor six-four chord).

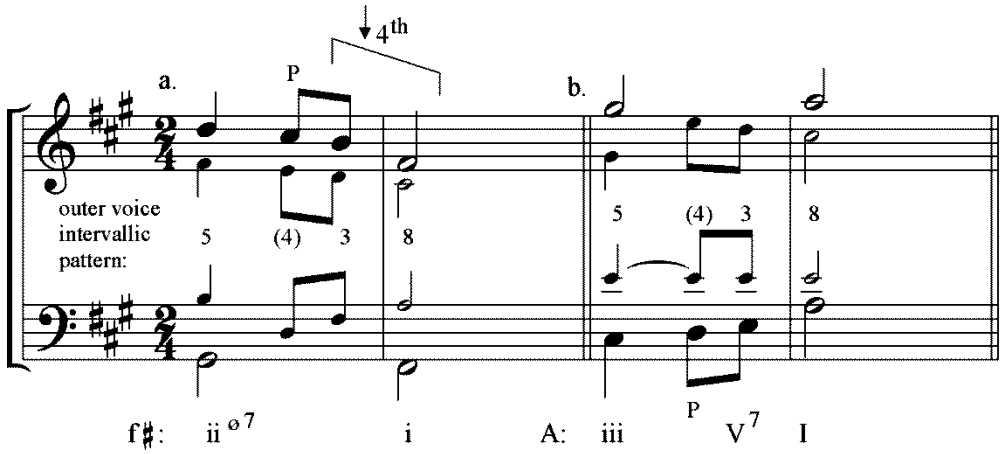
Example 2–29. Opening measures of String Quartet in C Major, op. 61, iii (trio). Phrase ends on vi but not as a typical deceptive cadence.



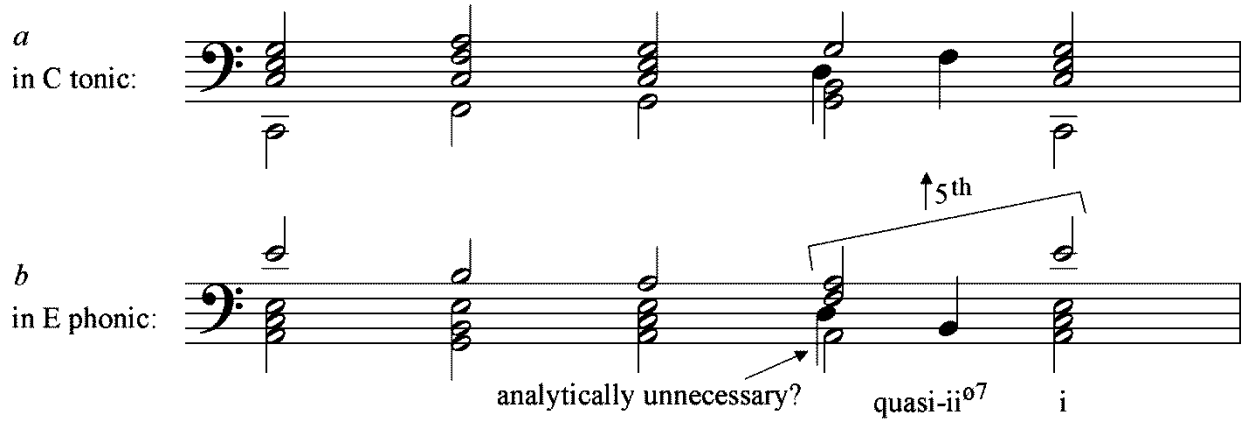
The similar motion to an octave in the outer voices is akin to an inverted authentic cadence; Example 2–30a is a simplified version of Dvořák's plagal cadence; Example 2–30b inverts the outer voices to illustrate a more typical authentic cadential voice-leading. Dvořák's cadential deformation is a real-life example of Oettingen's theory of the "phonic" cadence, an inversionally symmetrical dualistic opposition to the traditional "tonic" (authentic V–I)

progressions (see Example 2–31).[69] In Oettingen's phonic system, chord roots are reckoned from above, so that the bass note of what we would identify as ii^{ø7} in Oettingen's phonic cadence is analytically unnecessary (much the same as was the soprano of the V^7 in Example 2–31a); he would identify this chord as a species of the *Unterregnant* (i.e., "under-fifth chord").

Example 2–30. Simplified version of Dvořák's plagal cadence and its authentic "inversion."



Example 2–31. Analogous cadences in Oettingen's two tonal systems, taken from Harrison 1994, 249.

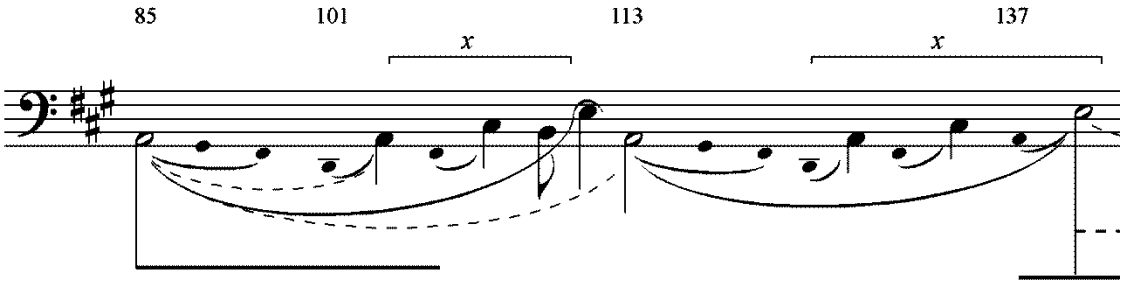


[69] Cf. Harrison, *Harmonic Function in Chromatic Music*, especially 242–49, for his discussion of Oettingen's *Harmoniesystem in dualer Entwickelung* (1866). Oettingen was forced to admit the (extreme) rarity of phonicity in the music of his time; that is, his phonic system was theoretically, rather than empirically derived. David W. Bernstein also deals with Oettingen's theories in "Symmetry and Symmetrical Inversion in Turn-of-the-Century Theory and Practice," in *Music Theory and the Exploration of the Past*, ed. David W. Bernstein and Christopher Hatch (Chicago: University of Chicago Press, 1993), 377–408.

The ascending cadential fifth in Oettingen's example is analogous to Dvořák's cadential descending fourth (Example 2–30a). There are some differences between the voice leading in Dvořák's cadence and that of Oettingen's model; for instance, Dvořák leads $\hat{2}$ down to the tonic (when, in Oettingen's model, $\hat{2}$–$\hat{3}$ is the phonic analog of the typical $\hat{4}$–$\hat{3}$ in an authentic cadence). Nevertheless, the similarity between Dvořák's practice and Oettingen's theory is worth exploration. It is doubtful whether Dvořák knew Oettingen's work, and, given the rarity of phonicity and/or phonic cadences in music of his contemporaries, it is unlikely Dvořák modeled this cadence after someone else's work. It seems he developed it on his own, and it is only a happy coincidence that a contemporary theoretical construct exists as a lens through which we can view Dvořák's imaginative cadential gesture.

This special species of cadence is not the only plagal attribute of this movement. In spite of the harmonically surprising submediant chord at the cadence, the theme is metrically stable, generally presenting itself in four- or eight-measure phrases. This foursquare stability allows us, as listeners, to better focus on the unfolding of the tonal plan of the movement. Example 2–32 shows how plagal relations persist at a slightly deeper level, decorating the arpeggiation of the tonic triad (marked by the brackets at *x*). In this way, we can see the prominence of the plagal domain at cadences and in local progressions throughout the movement.

Example 2–32. Bass-line reduction of the tonal plan for op. 61, iii, mm. 85–137.



Subtonic $\hat{7}$.

As was the case with $\hat{6}$, the renewed interest in both liturgical modality and folk music in the later 1800s, especially by "nationalistic" composers (Grieg, Dvořák, Borodin, etc.), sparked interest in using the subtonic as cadential agent. Concomitantly, minor triads as dominants, once an unlikelihood, become more common in the musical language of the late nineteenth century. The ability of $\flat\hat{7}$ to transmit dominant function is problematic for some theorists. Charles Smith, for example, claims that minor v lacks function, and elsewhere is more explicit, claiming that only twelve chromatic keys exist (as opposed to twenty-four) because there are only twelve possible (major) V chords: "Furthermore, since the leading tone is thereby a pivotal member of the minor-mode version of any key, $\flat\hat{7}$, despite its prominence in historical presentations of minor, must be relegated to a decorative or inflectional role, if our primary concern is tonal function."[70] In a similar fashion, Daniel Harrison has noted "the unlikelihood that a minor triad can transmit dominant function," but this seems to contradict his theory that both forms of $\hat{7}$ transmit dominant function. To be fair, Harrison's quotation is taken from a context dealing with

[70] Charles Smith, "The Functional Extravagance of Chromatic Chords," 116 and also 112, n. 23. In identifying $\hat{7}$ as the agent of dominant function, both Harrison and Smith follow the lead of Leonard Ratner, who discusses the issue similarly in *Harmony: Structure and Style* (New York: McGraw-Hill, 1962).

the specific case of a minor triad as the goal of an augmented-sixth discharge.[71] In other respects, subtonic $\hat{7}$ acts as a weaker version of its cousin, the leading tone (the quintessential carrier of dominant function).[72]

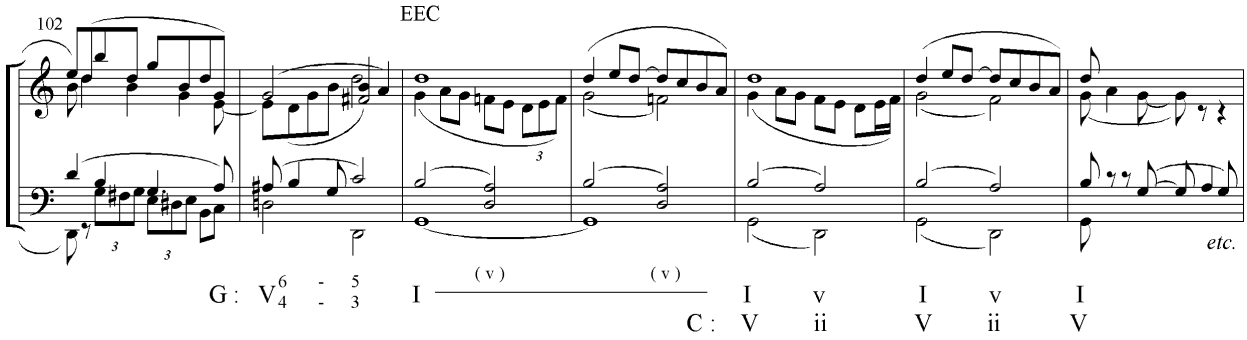
I suppose one could quibble with Charles Smith's definition of "tonal" here. One could claim that pieces incorporating minor v are by distinction "modal." Occasionally, it *will* make sense to refer to pieces incorporating minor v as modally referential; we might speak of a Mixolydian , Aeolian, or Dorian $\hat{7}$ depending on whether the surrounding context is predominantly major or minor.[73] Nevertheless, there are many cases in *tonal* Western concert music where the subtonic transmits dominant function. Dvořák's String Quartet in C Major, op. 61 (1881), is not a modal composition in the same way, say, a Vaughan Williams symphony might be. And yet, Dvořák's music is a locus for the study of dominant-functioned subtonics in what is otherwise typically tonal music.

The end of the exposition of Dvořák's String Quartet in C Major, op. 61 (see Example 2–33) provides an example of a cadence using the subtonic as a replacement for the leading tone. The minor dominants in this example—coming as they do after the point of Essential Exposition Closure (EEC), which *does* involve the leading tone—may be construed as coloristic post-cadential reiterations of the cadence; they clearly show, however, the potential for emancipation given different circumstances. One could argue that the return of F♮ is simply canceling the F♯ as part of a retransition back to C major for the repetition of the exposition; while this is certainly

[71] Harrison, "Supplement to the Theory of Augmented-Sixth Chords," 187. In the context of the article, he is trying to validate the pre-tonic nature of some augmented-sixth chords.
[72] Harrison, *Harmonic Function in Chromatic Music*, 52–53. Also on these pages he discusses the harmony textbook of Louis and Thuille, in which they claim the subtonic does not act as a dominant agent except by "coercion," examples of which they do not give.
[73] Riemann consistently calls the lowered seventh Mixolydian, even in otherwise tonal contexts, such as the retransition from a large-scale dominant key area to the tonic, when the ♯$\hat{4}$ that had been the leading tone of the dominant is cancelled by ♮$\hat{4}$.

true, D minor here is acting more clearly as a minor dominant than as a pre-dominant or as some sort of consonant contrapuntal support for an upper-voice passing or neighboring tone. One might also point out that G in the bass is retained as a pedal point in mm. 103–04 and that the resulting chord is a V^9, but the following measures, in which D is actually sounded in the bass, point more toward an understanding in which D minor is granted an actual harmonic existence, albeit locally, as a minor dominant.[74] As such, it fulfills the criteria Biamonte set forth for identifying a passage containing *modal harmony*.

Example 2–33. String Quartet in C Major, op. 61, mm. 102–08. D-minor triads sound like minor-dominant chords after the EEC.

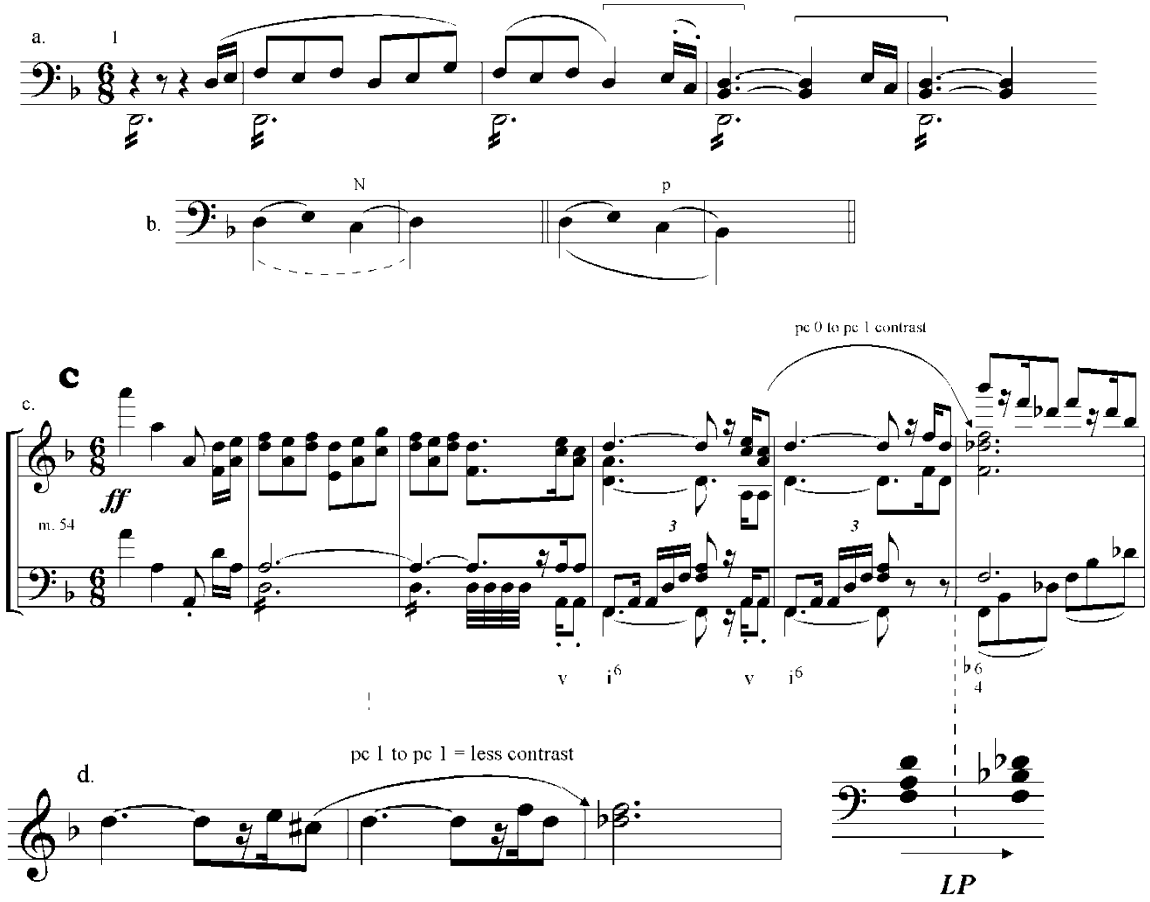


Two effective and striking examples of the subtonic as a leading-tone substitute can be found in the opening of the first movement of Dvořák's Seventh Symphony, op. 70. In the first case, the subtonic both resolves back to the tonic and allows for a stepwise descent from D to B♭, see Example 2–34a and 2–34b. In the second example, Dvořák rendered the unexpected arrival

[74] An analogous process in Classical-era music is one in which a complete T–S–D–T progression is sounded at the beginning of a phrase over a tonic pedal and then later in the phrase gives way to an actual root-based (T)–(S)–D–T progression. The first movements of Beethoven's Piano Sonatas op. 13, "Pathetique," and op. 14, no. 1, provide two paradigmatic examples. To be sure, in Dvořák's string quartet, the role of F♮ at a deeper lever *is* to help transition back to C, but that doesn't change its identification as a minor dominant at the surface.

of a B♭-minor cadential six-four chord even more surprising since the pitch-class D♭ (pc 1) had not been sounded already as C♯ (also pc 1); that is, in addition to its connective role between D and B♭, C♮ (pc 0) provides more of a contrast to the following D♭ (pc 1) in the B♭ minor chord than the third of a traditional dominant chord could have; see Example 2–34c for a reduction of m. 54ff and Example 2–34d, which recomposes the passage to include a leading tone instead of the subtonic. Incidentally, the resolution of v to i^6 in Example 2–34c means that the bass tone can be retained as a common tone in the ***LP*** transformation of D minor to B♭ minor, which helps make the transition smoother than root-position chord could have (essentially a chromatic 5–6 progression over a stationary bass.)

Example 2–34. Ramifications of the use of subtonic $\hat{7}$ in the Seventh Symphony, i, opening.



Dvořák's "New World" Symphony (1895) provides us many examples of the subtonic as a leading tone substitute, sometimes as a cadential agent at the end of a phrase. In the first example, from the first movement (Example 2–35a), a minor dominant is implied on the downbeat of m. 94 though the subtonic delayed by a 4–3 suspension. Occurring over a locally-functioning dominant pedal, however, the subtonic's role as a cadential agent is somewhat undercut by harmonic stasis. The second example (Example 2–35b) presents the main theme of the last movement. The melodically prominent subtonic is at first harmonized by III^6, itself a (minor) dominant substitute as evidenced by the outer-voice counterpoint.[75] A few other factors point to a nineteenth-century harmonic idiom, including $ii^{\text{ø}6}_5$ resolving back to the tonic of m. 11, and the contrapuntal cadence where we might have expected a cadential six-four (see the bracketed Roman numerals of the example).[76]

In Example 2–35c, a free variation on the opening theme, the subtonic is again harmonized by III^6 and also serves as a short-term goal with the arrival of a half cadence in the third measure (where it is harmonized by ♮VII); this is a good example of the Moravian modulation, which was discussed in the last chapter on pp. 41–43 (and see Example 1–12).[77] The consequent phrase re-begins with E minor in the fourth measure; thus, we can hear the ♮VII as fulfilling the same role as the dividing dominant of Classical-era music (and the more

---

[75] The emphasis on pentatonic elements and the substitution of III^6 for the dominant is certainly highlighted in this piece, but a quite similar, if less blatant, treatment of the same elements can be found in (much) earlier works, such as the first twenty measures or so of the Piano Quartet in D Major, op. 23 (1875).

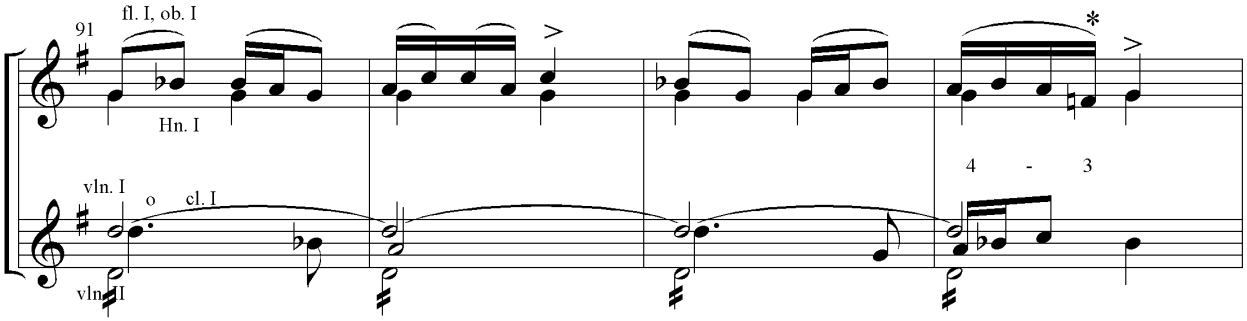
[76] Analytical echoes of Rameau come into play at m. 11. Although the chord could be heard as a simple iv with an accented passing tone in the melody, the simultaneous sounding of the complete supertonic seventh chord leads me to analyze it as such (though I could just have easily labeled the chord a iv^{+6}). Either way, the effect is one typical of nineteenth-century musical rhetoric.

[77] For a fuller discussion of the genesis of these two passages, see Clapham, "The Evolution of Dvořák's Symphony 'From the New World,' *The Musical Quarterly* 44, no. 2 (Spring 1958), 167–83. As I have already stated, when I refer in the abstract to the subtonic scale degree or chord, I will write "♭$\hat{7}$" or "♭VII" but for specific cases, I will use the accidental that best describes the music.

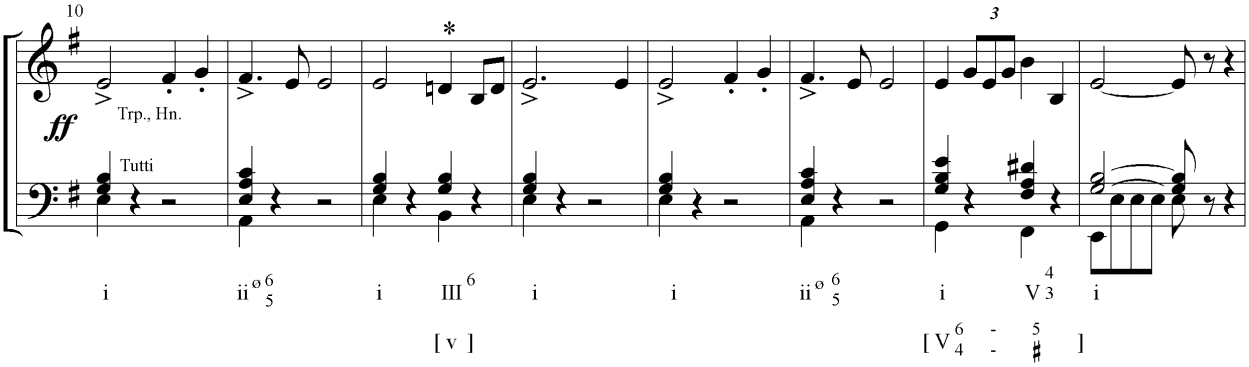
traditionally oriented music of the late 1800s). In fact, ♭VII (or the minor dominant) can easily substitute for V in the standard interruption model of an antecedent-consequent phrase since they both support a melodic $\hat{2}$. This can clearly be seen from Example 2–36, a reduction of Example 2–35c (mm. 44–50).

Example 2–35. "New World" Symphony excerpts that include a modal subtonic $\hat{7}$ (shown by an asterisk).

a. "New World" Symphony, i, subtonic occurs over a dominant pedal.

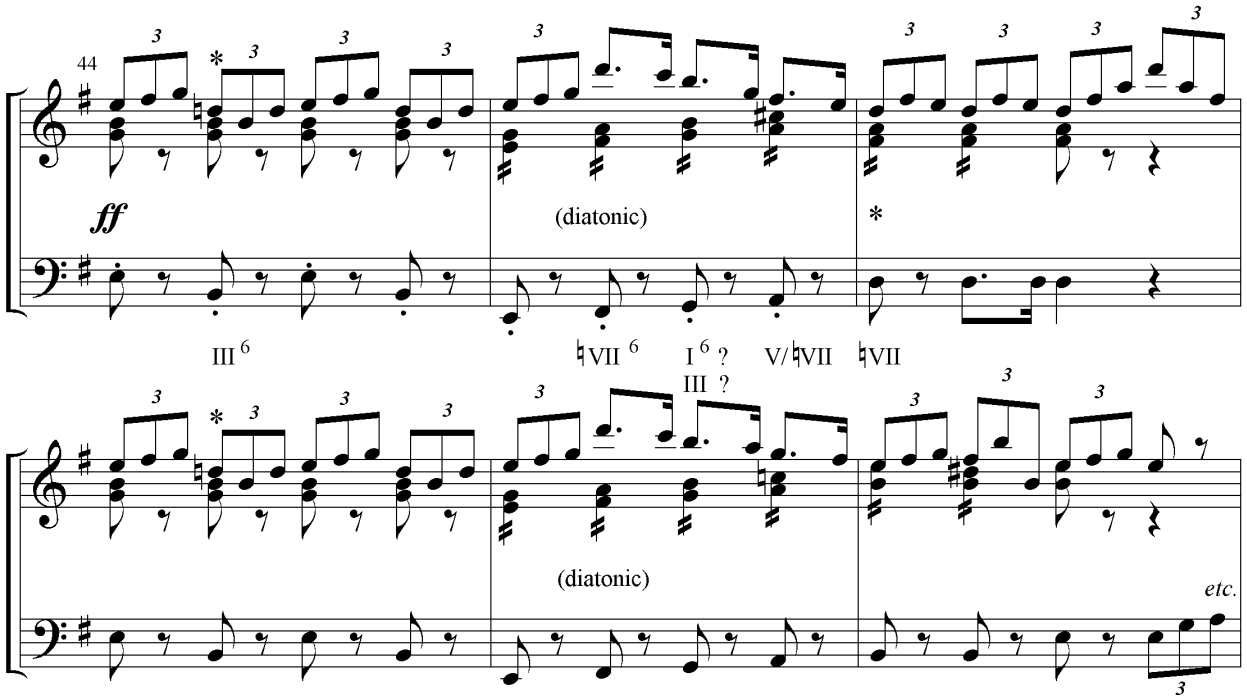


b. "New World" Symphony, iv, subtonic $\hat{7}$ occurs as part of III^6 a minor-dominant substitute.

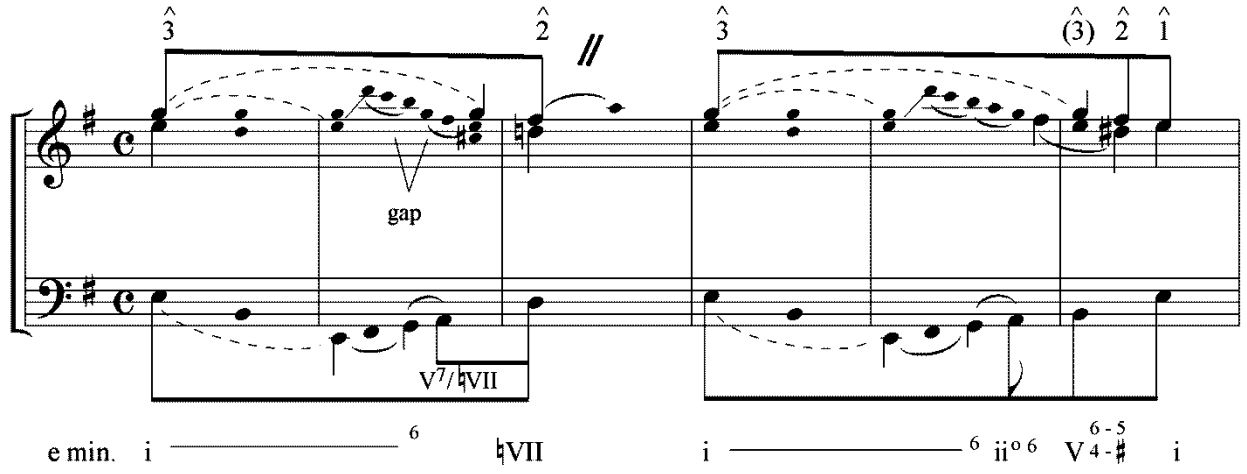


Example 2–35. continued.

c. “New World” Symphony, iv, subtonic $\hat{7}$ occurs as part of III^6 a minor-dominant substitute, but there are also diatonic versions of the ♭VII.



Example 2–36. Reduction of the “New World” Symphony, iv, mm. 46–50.



Dvořák's use of the minor dominant as an important chord within progressions, and occasionally as a cadential chord at the end of progressions, contextualized the subtonic as a more normative pre-tonic or cadential agent.[78] He helped create a new category of back-relating dominant substitutes incorporating $\flat\hat{7}$ (that is, minor v and $\flat$VII). Even if these characteristic progressions were perceived as nationalistic traits in his music, which we know was internationally popular, his use of these chords helped legitimize their use in concert music, partly paving the way for the following generation(s) of composers. Not surprisingly, the minor dominant and the modal use of $\flat$VII as a dominant substitute became increasingly common in the twentieth century, both in concert music (see, for instance, mm. 21–23 of Debussy's "La fille aux cheveux de lin," Preludes, Book I, no. 8, which echoes the $\flat\hat{6}$–$\flat\hat{7}$–$\hat{8}$ of the end of Dvořák's "New World" Finale, m. 329ff) and in American popular music and jazz, where the replacement of $\flat$VII or $\flat$VII^7 for V came to be known as a "backdoor" dominant substitution in a ii–V–I "turn-around" progression.[79]

It may be useful to imagine an unconformed (justly tuned) *Tonnetz* (see Example 2–37) to conceptualize the role of the dominant-functioning subtonic scale degree and/or chord as illustrated in the previous examples (the two instances of $\flat$VII are highlighted in gray and the minor v is shown by the dotted triangle).[80] I wish to illustrate here that the dominant-functioning $\flat$VII chord and minor v are not at all remote from the major tonic triad (shown in a solid-lined

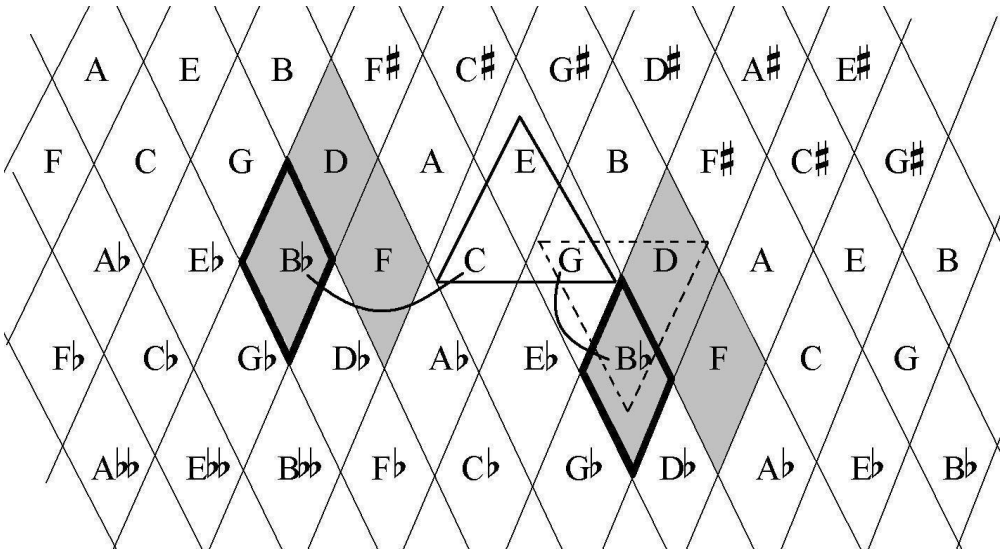
[78] See also Rey Longyear and Kate Covington's discussion of the minor dominant in the Requiem, op. 89.

[79] On the possibility of chords substituting for other chords a third away (such as $\flat$VII for V), see Nicolas Meeus "Toward a Post-Schoenbergian Grammar of Tonal and Pre-tonal Harmonic Progressions," *Music Theory Online* 6, no. 1 (January 2000). These ideas are used to good effect in Paul S. Carter's discussion of the role of $\flat$VII as a dominant substitute in rock music in his *Retrogressive Harmonic Motion as Structural and Stylistic Characteristic of Pop-Rock Music* (Ph.D. diss., University of Cincinnati, 2005).

[80] For a comprehensive account of the *Tonnetz* in both historical and recent music theorizing, see Richard Cohn's "Neo-Riemannian Operations, Parsimonious Trichords, and Their 'Tonnetz' Representations," *Journal of Music Theory* 41, No. 1 (Spring 1997), 1–66. Daniel Harrison's discussion of the *Tonnetz* in "Nonconformist Notions of Nineteenth-Century Enharmonicism," is also of interest here, especially pp. 132–36.

triangle in the example—it is even more closely related to the minor tonic triad). And, if just intonation were taken into account, as per an unconformed *Tonnetz*, the dominant-functioning B♭ would be a syntonic comma sharper than the B♭ that is ***S*** of ***S*** due to its placement with regard to the origin, C, in the *Tonnetz*.[81] It would be as if the B♭ were striving to "correct itself" to more closely resemble the leading tone. This has intriguing implications for performance practice as it concerns the expressive use of tuning (at least in instruments capable of pitch manipulation).

Example 2–37. Representation of the relationship on the *Tonnetz* between I and chords containing the subtonic (♭VII and v).



If we understand ♭VII in a particular context as a third-related substitute for the dominant, it is conceptually (and experientially) closer to a given tonic than the ♭VII located two fifths away on the subdominant side. When ♭VII proceeds to a subdominant-functioning

[81] Cf. Harrison, 133.

harmony, it may be considered a "secondary-subdominant" (***S*** of ***S***), but in all of the examples from Dvořák's music shown above, it has functioned as a dominant-side sonority. Referring again to Example 2–37, we see that for C $^{\text{major}}_{\text{minor}}$, the minor v (shown by the dotted triangle) is in a direct-fifth relation to the tonic; as the third of this chord, B♭ (♭$\hat{7}$) is drawn into a more direct relation to the tonic chord than the B♭-as-root that lies two fifths away on the *Tonnetz*.

Accumulations of notes above $\hat{5}$.

The dominant scale degree as a communicator of dominant function has been given short shrift by some theorists, such as Charles Smith and Daniel Harrison, who assert that $\hat{7}$ is *the* agent of dominant function, not $\hat{5}$. Their analytical pendulum has swung away from bass-oriented theories of harmony. Although Harrison does accord $\hat{5}$ a strong role as the "base" of Dominant function, even when it is in the bass it is still clearly subordinate (or coeval at the very best) to the leading tone, and as such, both Harrison and Smith marginalize the acoustical basis of musical understanding. When $\hat{5}$ is in the bass (as a base), it can easily—almost single-handedly—bear the onus of dominant function, surely as well the leading tone. The encroachment of the subtonic onto the domain of the leading tone was initially enabled by the presence of $\hat{5}$ in the bass. The role of $\hat{5}$ in the bass provided a dominant-function grounding whose importance cannot be overlooked.[82]

Earlier in this study, I used Dvořák's Waltz, op. 54, no.2 (shown in Example 2–15) to illustrate an unusual sonority derived by voice leading, downplaying an interpretation of the

[82] We can then identify a conflict here between two modes of thinking about function: a Rameauvian fundamental bass oriented approach on the one hand, and, on the other hand, a Harrisonian functional scale-degree oriented approach. Kevin Swinden attempts a kind of rapprochement between the two theories in "When Functions Collide."

chord as a dominant sonority, but it can also serve as an example of the type of dominant build-up under discussion here. Other instances include the sort of triadic superimpositions discussed in Example 2–23, Example 2–24, and Example 2–27b, that last of which shows that "V^{11}" is essentially a IV chord over $\hat{5}$.[83] The dominant scale degree in the bass came to support aggregations of notes which, while not traditional dominant chords, nevertheless maintained a semblance of dominant function. In this, Dvořák perhaps found a precedent in the Finale of Beethoven's Ninth Symphony, in which the second *Schrenkensfanfare* (as Wagner called these outbursts) contains all the notes of the harmonic-minor scale above $\hat{5}$. Although other contemporary composers would push the envelope further in this regard—Mahler would write a similar *Schrenkensfanfare* immediately preceding the recapitulation of the first movement of his Symphony no. 2, "Resurrection" (1894)—Dvořák was not immune from the desire to color traditional dominant-tonic progression by expanding the types of tonal aggregations that could exist above $\hat{5}$.[84]

Conclusion.

Throughout this chapter, I have tried to show the ways in which Dvořák participated in both chromatic and diatonic expansions of Classical-era tonality. Using wide-ranging chromatic means, such as the utilization of parsimonious voice leading between triads and seventh chords,

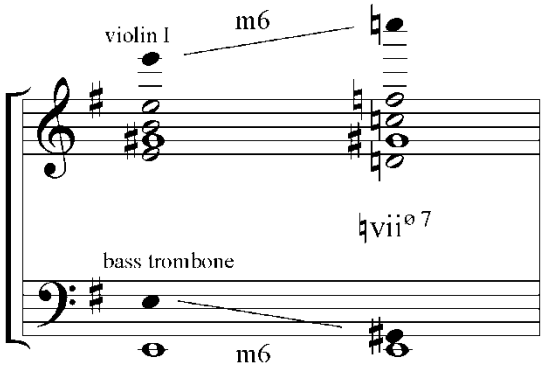
[83] Cf. Swinden for an interesting discussion of such functionally mixed harmonies and also a fuller exploration of chord function as it relates to characteristic bass lines in nineteenth-century music.

[84] The culmination in experimentation with such dominant-function tonal masses (in art music) is surely the "Invention on a key" section of Alban Berg's *Wozzeck* (the key in question is D minor), in which the twelve-tone aggregate is sounded over $\hat{5}$ and still clearly communicates dominant function. Examples of dominant-functioning tonal structures above $\hat{5}$ are legion in jazz and popular music.

and inventive diatonic procedures, especially those involving modality and pentatonicism, Dvořák carved out a unique harmonic language for himself, a niche which seemed, somewhat contradictorily, both familiar *and* progressive to his contemporaries. In addition to these kinds of inner-phrase harmonic developments, I have also tried to show the ways in which Dvořák expanded both plagal and authentic cadential progressions. For the former, we are especially aware of his innovations regarding the $\hat{6}$–$\hat{8}$ cadence and Oettingen's phonic cadence. For the latter, we have seen that Dvořák's main contribution was to help legitimize the cadential power of a subtonic agent, though he was also involved in the nineteenth-century pursuit of non-traditional dominant-functioned harmonies.

As a closing example, I offer Dvořák's oscillating cadential punctuation of the Finale from his Ninth Symphony (Example 2–38). The striking and highly original characteristic harmony of the second chord is an amalgam of the Neapolitan-plagal and subtonic-authentic functions explained above—indeed, according to Harrison's theory, it is quite the *rara avis* since it contains the functional agents of all three primary harmonies ($\sharp\hat{3}$, $\flat\hat{6}$, and $\flat\hat{7}$). If we must attach a Roman numeral, it would best be explained as a subtonic vii$^{\text{ø}7}$ over a tonic pedal.

Example 2–38. The oscillating chords from the Ninth Symphony Finale, mm. 237–39.



Although the individual tones of the chord arise through the traditional techniques of pedal point and neighboring motion (as shown by the whole notes and half notes of the example, respectively), Dvořák chooses to highlight the symmetrical properties of the augmented triad subset of the sonority through leaps in the first violins and bass trombone (shown by the filled-in note heads, a minor sixth above and below the tonic). In this way he anticipates the final cadential gesture of the Finale of Mahler's Seventh Symphony, which incorporates an unadorned augmented triad.

Dvořák's final essay in the symphonic genre can be thought of as a valedictory summary of Romantic harmonic techniques, some well-established and others very new; techniques such as chromatic mediant relationships, expanded subdominant function, chromatic voice-leading between dissonant sonorities, and substitutions of the submediant and subtonic for the leading tone are all put to good use in this symphony. We might see this summarizing gesture as analogous to similar gestures by Bach, who himself mirrored and compressed a generation of Baroque compositional techniques and various national styles into his own work.

It would be erroneous to claim that Dvořák's compositions were not an important part of the *Zeitgeist* of the late 1800s regarding the chromatic expansion of the Classical-era tonal palette; his interest in, among other things, chromatic mediants and the parsimonious relationships between seventh chords, ambiguity that engages the listener's sense of *Mehrdeutigkeit*, religious- and folk-derived modality, the exploitation of non-traditional dominant-functioning harmonies, the investigation of plagal realms, and his various cadential innovations prove otherwise. Without a doubt, Dvořák's musical style is integral to our understanding of the late-nineteenth-century harmonic idiom.

Part II. Form

INTRODUCTION

Musical form was not wholly taken over from Classical practice in the music of the nineteenth century. We are reminded by Carl Dahlhaus that "musical form was strangely ambiguous in the romantic period. As a rough categorization, either it was schematic or it was disintegrated."[1] The following two chapters will examine the "strange ambiguities" that can be found in Dvořák's treatment of sonata form. Of especial interest is how Dvořák was (eventually) able to maintain the Romantic imperative of originality while simultaneously creating works that are formally intelligible—neither schematic nor disintegrated, but some happy middle ground between those two treacherous poles.

Dvořák's employment of sonata form will be the basis of chapter 3. Drawing on Hepokoski and Darcy's Sonata Theory, I will closely examine issues related to the treatment of the second group (comprising the S- and C-zones) in the exposition and recapitulation.[2] This includes the preparation of the S-zone through a medial caesura (MC), which in Dvořák's music is often problematized in some way, and the issue of whether or not there is a point of essential exposition closure (EEC).

I will then explore in chapter 4 an intriguing style change in Dvořák's music that began around 1880, a change that has often been attributed to Dvořák's growing acquaintance with

---

[1] Dahlhaus, *Nineteenth Century Music*, trans. by J. Bradford Robinson (Berkeley: University of California Press, 1989), 87.

[2] A note on terminology: the term "second group" as used by writers such as Tovey (after the German term *Seitensatz* popularized by A. B. Marx) denotes all themes after the medial caesura, including closing themes. As such, it comprises both the S-zone and the C-zone of Hepokoski and Darcy's Sonata Theory. I will use the term "second group" to refer to the *entire* second half of the exposition, and "S-zone" or "C-zone" where appropriate when making observations about more specific formal functions. I will avoid the term "second subject" since it is imprecise; it does not clearly refer to the S-zone in particular or the second group in general.

Brahms and his circle. This chapter will include a much more detailed account than has been attempted to date of the question of Brahms's influence on Dvořák, including stylistic analyses of several sonata-form works written between 1877 and 1880.

CHAPTER 3. DVOŘÁK'S SONATA FORMS.

In spite of the New Germans' famous antipathy toward Classical forms, many nineteenth-century composers continued to utilize sonata form, especially for chamber works, and, particularly in the second half of the century, the symphony.[3] It is common for musicologists writing about the music of the later nineteenth century to discuss the conflicts that arose between content, which was increasingly original and striking, and form, which became increasingly distant from Classical norms. Dahlhaus has stated, a bit hyperbolically, that

> in the romantic period, the individuality of a piece of music—which in turn established its status as art—was imparted primarily by the themes and motives as such rather than by the formal process they set in motion. And the fact that the paramount aesthetic factor is the musical idea per se means that the substrate of the contents is subject to less far-reaching transformations than is the case with Beethoven, where the "poetic idea" is focused in the formal process.[4]

In a similar vein, James Webster has written that

> sonata form was more congenial to Classical than Romantic temperaments. In Romantic styles, the focus on the explicit "contents" of music, on original themes, on continual thematic transformation, and on dynamic processes inhibited the full integration of complex structures along Classical lines. The Romantics believed that a sonata-form exposition was governed more by the contrast between the "first theme" and the "second theme" than by the tonal polarity between the keys of the first and second groups. Hence

[3] For a thoughtful account of the "second life" of the symphony, see Dahlhaus, *Nineteenth Century Music*, 265–76.
[4] Ibid., 87.

> their sonata form tended to weaken the structural significance of the exposition as a large scale half-cadence moving to the dominant.[5]

These quotations from Dahlhaus and Webster illustrate the general trends of the period but, painted in the broadest of strokes, overlook the fact that certain composers, such as Brahms and Dvořák, were able to effect a satisfactory rapprochement between the Romantic drive toward originality and the intelligible processes of the Classical sonata style. Indeed, exploring such a rapprochement is the germinal idea that grounds David Beveridge's dissertation.[6]

Beveridge discusses *all* of Dvořák's sonata forms. Thus he is able to make perspicuous observations about Dvořák's overall artistic development and certain features of his style, but he rarely expends more than a few pages on individual works. By contrast, I will concentrate only on first movements from the chamber and orchestral music of Dvořák's maturity (post-1876). First movements constructed in sonata form are usually more rigorously constructed and tight-knit than other movements that utilize sonata form,[7] and the music of Dvořák's maturity is where he most often used these sonata forms successfully. That is, Dvořák's early sonata-form works are sometimes overly diffuse, discursive, or needlessly repetitive. His mature sonatas, on the other hand, most often exhibit a remarkable degree of motivic and formal economy. Dvořák

---

[5] James Webster, "Schubert's Sonata Form and Brahms's First Maturity," *19th-Century Music* 2, No. 1 (Summer 1978), 18.

[6] David Beveridge, *Romantic Ideas in a Classical Frame: The Sonata Forms of Dvořák* (Ph.D. dissertation, University of California, 1980).

[7] Middle movements are often sonata forms without development, sometimes referred to as "slow movement form" or "Exposition-Recap form," but which Hepokoski and Darcy call a Type 1 sonata. Sonata-form finales are often cross-pollinated by various rondo elements (Hepokoski and Darcy's Type 4 sonata). James Hepokoski and Warren Darcy, *Elements of Sonata Theory* (New York: Oxford University Press, 2006). See also Charles Rosen, *Sonata Forms*, revised edition (New York: Norton, 1988), especially chapter 6, 98–132, where he discusses first-movement form as distinct from other sonata-form movements.

himself probably had his own, later repertoire in mind when he wrote in 1894 that "modern taste calls for music that is concise, condensed and pithy."[8]

In this chapter, I will focus more narrowly on two issues regarding Dvořák's use of sonata form; both issues are related to Dvořák's treatment of what Hepokoski and Darcy refer to as the S-zone.[9] First, I will discuss the way Dvořák almost always prepares the second group through a medial caesura (MC), though Dvořák's treatment of the MC is not always as clear as that of his Classical forebears. Second, I will examine whether or not the S-zone terminates at a point of essential exposition closure (EEC). By extension, we can examine how the MC functions in the recapitulation, and whether or not there is a point of essential sonata closure (ESC) before the coda. The sometimes conflicting interactions between a Schenkerian account of the tonal background and the module-based Sonata Theory of Hepokoski and Darcy will often prove analytically beneficial, especially if we keep in mind Webster's comments about the importance of thematic contrast versus tonal polarity for Romantic composers.

Some might question the use of a theory developed for the analysis of eighteenth-century music for the music of Dvořák or Brahms. After all, deformations of the norms discussed in Sonata Theory would have been felt as such by contemporary audiences but the same might not be true for later audiences who may have become used to certain aspects of composers' formal liberties. In other words, techniques that had been deformational in the eighteenth century, such as the masking of the MC or an imperfect authentic cadence at the EEC-point, had become much

[8] From Dvořák's 1894 article on Schubert in *The Century Illustrated Monthly Magazine*, reprinted in John Clapham, *Antonín Dvořák, Musician and Craftsman* (New York: St. Martin's Press, 1966), 302. Dvořák also states in the same article that if Schubert's symphonies suffer from a fault, it is their prolixity.

[9] I will be using the terminology of Hepokoski and Darcy's *Elements of Sonata Theory* for my identification of the various parts of a sonata throughout this chapter.

more common in the later nineteenth century. Hepokoski and Darcy themselves suggest that these certain deformations in one era become lower-level defaults in the next.[10]

My response to this concern is threefold. First, Classical music comprised the main body of musical literature that was first studied by composers who were born in the 1830s and 1840s. They would have only later, in their teens and twenties, become more fully aware of the music of the immediately preceding generation of composers born around 1810 (Chopin, Liszt, Mendelssohn, Schumann, Wagner, et al.). I discuss the respective discovery of Schubert by Brahms and Dvořák below on pp. 240–43. The rediscovery of the music of Bach and Handel, led by Mendelssohn, among others, would have been a recent phenomenon.[11] Thus, Classical models were of paramount importance for a composer such as Dvořák or Brahms, especially in their formative years.

The second justification for the use of Sonata Theory to explore Dvořák's music is that simply by writing sonatas, chamber music, and symphonies, Dvořák placed his music in dialog with earlier efforts in the same genres, inviting comparison with those earlier works. Other composers, such as Wagner, who did not wish such a comparison, wrote operas, tone poems, short character pieces, or programmatic works. While Dvořák, too, wrote operas and tone poems, these works are not judged by the standards of Sonata Theory. Also, since Classical music did not lose its place in the concert repertoire as Renaissance or Baroque music did at the beginning of the 1800s, it is probable that contemporary audiences would have maintained a high level of what Leonard Meyer calls stylistic competence; they would have been able to readily

[10] This is related to Hatten's discussion of style change in *Musical Meaning in Beethoven*, esp. pp. 64 and 246–270.
[11] For example, Brahms subscribed to the publications of the Bach-Gesellschaft from its inception in 1850 and only in his twenties embarked on a study of counterpoint, refer to David Brodbeck, "The Brahms-Joachim Counterpoint Exchange," *Brahms Studies* 1, David Brodbeck, ed. (Lincoln, NE: University of Nebraska Press, 1995), 30–80.

appreciate the types of sonata deformations practiced by Dvořák against the received traditions of Classical practice.

Finally, in the last decade Sonata Theory has attained a paradigmatic status in some circles akin to Schenkerian studies for the study of Classical form. Inasmuch as Romantic sonata practice grows out of Classical traditions, one must question the applicability of Sonata Theory as an explanatory model for this later repertoire and the accommodations that it must make. After all, the highly punctuated textures and formal symmetries of the Classical tradition give way to a more fluid and continuous version of the sonata. The authors of Sonata Theory themselves grapple with this in their individual studies of the music of Bruckner, Mahler, Sibelius and Straus; other authors have applied and accommodated Sonata Theory to works by Brahms, Liszt, Schubert, and Shostakovich, among others.[12] In this spirit, I will attempt to show that the explanatory power of Sonata Theory is relevant for the music of Dvořák, but that it needs to be modified somewhat to accommodate blurred formal boundaries that he often employs

One of the most striking things about Dvořák's sonata practice is the creativity he expended in crafting the S-zone and the manner of its closure (or, in some cases, nonclosure). In both thematic and harmonic conceptions of sonata form, the S-zone is salient for its presentation of material that is somehow set in opposition to the primary group through tonal opposition and/or thematic contrast. This large-scale tension was typically resolved in the recapitulation in

[12] To be fair, in their studies of later music, Hepokoski and Darcy often dispense with the formal labels of Sonata Theory and focus more on the concept of rotation. Cf. James Hepokoski, "Fiery-Pulsed Libertine or Domestic Hero?: Strauss's *Don Juan* Reinvestigated," in *Richard Strauss: New Perspectives on the Composer and His Work*, ed. Bryan Gilliam (Durham, NC and London: Duke University Press, 1992), 135–175, and "Rotations, Sketches, and the Sixth Symphony [of Sibelius]," *Sibelius Studies*, Timothy Jackson and Veijo Murtomäki, eds. (New York: Cambridge University Press, 2001), 322–51; Warren Darcy, "Rotational Form, Teleological Genesis, and Fantasy-Projection in the Slow Movement of Mahler's Sixth Symphony," *19th-Century Music* 25, no. 1 (Summer 2001), 49–74, and "Bruckner's Sonata Deformations," in *Bruckner Studies*, Timothy Jackson and Paul Hawkshaw, eds. (New York: Cambridge University Press, 1997) 256–77. See also Howard Cinnamon, "Classical Models, Sonata Theory, and the First Movement of Liszt's *Faust* Symohony," *Gamut* 4, vol. 1 (2011), 53–91 and Judith Kuhn, *Shostakovich in Dialogue: Form, Imagery and Ideas in String Quartets 1–7* (Farnham, Great Britain: Ashgate, 2010).

Classical-era works, but, especially after Beethoven, tonal resolution could occur in the coda as well. Dvořák constantly experimented with the approach to, presentation of, and termination of the expositional S-zone and, concomitantly, its manner of recapitulation.

Many critics, such as Clapham and Beveridge, find this experimentation to have been faulty in his early work, and indeed, his early work is often harmonically adventurous to the point of extreme discursiveness. Beveridge, in particular, calls attention to Dvořák's habit of prematurely returning to the tonic in S-zone spaces and/or developments.[13] He largely avoided these errors (as he may have come to perceive them) in his mature works. Most commentators agree that this period of full maturity began around 1876. The following sections of this chapter will draw on information from the chart shown in Example 3–1, which presents an overview of the various expositional and recapitulatory strategies Dvořák employed for his S-zones. As we can see, he did not employ a set model for his sonata-form construction.

[13] See Beveridge, esp. pp. 87–98, and Clapham, *Antonín Dvořák, Musician and Craftsman,* 27–35. Indeed, in Dvořák's earliest sonata-form pieces the S-zone will often cadence in the tonic; this happens in the String Quintet, op. 1 (1861), and the first and second movements of the First Symphony (1865). The finales of the Fourth Symphony (1874) and String Quartet in A Minor, op. 16 (1874) both present the S-zone in the tonic major (possibly modeled on Chopin's Piano Concerto no. 1 in E Minor).

Example 3–1. Dvořák's S-zone procedures in the exposition and recapitulation.

Piece Name	Burg-hauser number	Date composed	Approach to **S** **MC** present?	Key(s) of **S**	Expo repeat?	Notes **EEC** present/deformed?	Recap features **ESC** present/deformed?
Piano Trio in G Minor, op. 26	B. 56	Jan. 1876	- several failed attempts at securing an **MC**. - no real **MC** and "flawed" second group mean this is a continuous exposition.	- No **S**. Rather a **TR** → **FS** that begins on a cadential $\frac{6}{4}$ of B♭ (III) at m. 61 but modulates freely, and never cadences.	yes	- no **EEC**. - **TR** → **FS** is tonally unstable, and never cadences strongly before **P**-based material returns.	**P' TR** => **FS** coda i I i - recap. radically recomposed. - **ESC** at m. 312 dovetails with beginning of coda.
String Quartet in E Major, op. 80 (orig. op. 27)	B. 57	Feb. 1876	- relatively clear vi:HC **MC** at m. 48. - prepared by French-sixth type chord (II$^{7/o5}$).	vi (c♯) for **S**, but cadences clearly in C♯ for **C** module.	no →	- masked **EEC** at m. 75. - feint toward expo repeat, but with V^7/IV replacing I.	**P**^{1} **S**$^{1.1}$ → (**S**$^{1.2}$) coda I I (vi) I - **ESC** delayed by S$^{1.2}$ to m. 234
String Quartet in D Minor, op. 34	B. 75	Dec. 1877	- masked III:HC **MC** at m. 61 prepared by an augmented sixth D♭–B♮. - caesura-fill (*CF*) with hemiola.	III (F) – Classically normative.	yes	- clear **EEC** in F at m. 130 with $\hat{5}$–$\hat{4}$–$\hat{3}$–$\hat{2}$–$\hat{1}$ descent. - III → V$^4_3$ RT for expo repeat.	**P**^{1} **S** coda i I re-establishes i - **ESC** at m. 322, delayed by a suspension of $\hat{2}$ in mm. 318–21.
String Sextet in A Major, op. 48	B. 80	May 1878	- masked vii:HC **MC** (!) at m. 55. - quite abrupt. - dominant chord at the HC carries a seventh and minor ninth.	- tonally unstable; a zone in search of a tonality. - starts by hinting at V (E) but finally gels in III (C♯).	yes	- IAC **EEC** occurs at m. 89 - completion of melodic descent at m. 93 - modal decay at expo end.	**P**^{1} **S**^{1} – **S**^{C} coda I (unstable) VI V - I - **ESC**-substitute at m. 276. - $\hat{3}$–($\hat{2}$)–$\hat{1}$ linear descent in coda at m. 313.
String Quartet in E♭ Major, op. 51	B. 92	Dec. 1878 to Mar. 1879	- **TR** prepares wrong key of c minor. - vi:HC **MC** at m. 35. - then "snaps" to V:HC **MC** at m. 36. - double **MC** ("shadow").	- quasi three-key expo. - V (B♭) – over a dominant pedal at first and then modulates to VII (D).	yes	- rhapsodic construction. - **EEC**-substitute in D major at m. 63. - modal decay at expo end.	**S P'** P-based coda I I (III) I - reversed recap. - very clear **ESC** at m. 178.
Violin Sonata in F Major, op. 57	B. 106	Mar. 1880	- masked VI:HC **MC** at m. 46. - V^7/VI becoming V$^4_2$ of VI is indicator of CF. - hemiola.	VI (begins on VI^6)	yes	- no real **EEC** via cadence though closing rhetoric is present at m. 101. - Ends on V/d, a large-scale half cadence.	**P**^{1} **S** - V$^4_2$ of I^6 (FM) preps recap. - weak **ESC** at m. 280, although there is a later $\hat{3}$-$\hat{2}$-$\hat{1}$ descent over a tonic pedal mm. 290–1.
Symphony no. 6 in D Major, op. 60	B. 112	Aug.– Oct. 1880	- clear vi:HC **MC** at m. 105. - V/vi → vi is anticipated during **TR** but is not heard as **MC** due to thematic considerations.	**S**^{1} → **S**^{2} vi VI m. 108 m. 120	yes*	- unstable **S** at first, but a clear cadence and **EEC** in B thru $\hat{5}$–$\hat{4}$–$\hat{3}$–$\hat{2}$–$\hat{1}$, mm. 161–7. - modal decay at expo end.	**P**^{1} **S**^{1} **S**^{2} coda I i (m. 402) I (m. 414) - V/d – D preps recap. - clear **ESC** (m. 420).

*Dvorak later wrote in a performing score, now in the possession of the Czech Philharmonic Orchestra, that he wished for this repeat to be eliminated.

Piece Name	Burg-hauser number	Date composed	Approach to **S** **MC** present?	Key(s) of **S**	Expo repeat ?	Notes **EEC** present/deformed?	Recap features **ESC** present/deformed?
String Quartet in C Major, op. 61	B. 121	Nov. 1880	- ♭III:HC **MC** at m. 62. - V/E♭ becomes F♭-based augmented-sixth approach through CF.	♭III → V m. 69 arrives m. 83	yes	- Schubertian-style 3-key expo. - lengthy C-zone after IAC-type **EEC** at m. 87.	**P²** **S** coda I III♯ (coda restores I) - **ESC**-substitute at m. 250. - Linear descent m. 305 of coda.
Piano Trio in F Minor, op. 65	B. 130	Feb.– May 1883	- VI:HC **MC** at m. 53. - V/D♭ becomes E♭♭-based augmented-sixth approach through CF.	VI (D♭) at m. 57	no	- **EEC** at m. 99. - clear $\hat{3}$-$\hat{2}$-$\hat{1}$ descent in D♭ at mm. 103–04 of **C**-zone. - conflict between surface detail and linear structure.	**P¹** (no **P²**) **S**–**C** coda i I (coda restores i after clear **ESC**) - **ESC** at m. 285 and literal $\hat{3}$-$\hat{2}$-$\hat{1}$ descent at mm. 291–92.
Symphony no. 7 in D Minor, op. 70	B. 141	Dec. 1884 to Mar. 1885	- vi:HC MC-feint at m. 61 - VI:HC **MC** at m. 71	VI (B♭) → vi (b♭) m. 73 m. 111 modal decay to **EEC**.	no →	- clear **EEC** in b♭ minor (!) at m. 115. - **P**-based **C** re-establishes B♭, then blurs into the development. - feint toward expo repeat on V/d (m. 137).	**P²** **S** coda i I → i i - Clear **ESC** at m. 246.
Piano Quintet in A Major, op. 81	B. 155	Aug.– Oct. 1887	clear iii:HC **MC** with gap at m. 92 (i.e., no CF)	iii (c♯) begins at m. 93	yes	- clear **EEC** in c♯ at m. 149 ($\hat{5}$–$\hat{4}$)–$\hat{3}$–$\hat{2}$–$\hat{1}$ in c♯ - iii → iii$\frac{4}{2}$ (≈V$\frac{4}{3}$) RT for expo repeat.	**P²** **S** coda I vi coda restores I at m. 406 - **ESC**-substitute at m. 383. - **P**-*telos* at m. 406
Piano Quartet in E♭ Major, op. 87	B. 162	Aug. 1889	V/B → V/G **MC** at m. 39 is in the "wrong" tonality (a la Schubert) but is corrected during CF.	III (G) begins at m. 43 over one measure of V⁷.	no →	- **EEC** thwarted at m. 71. - development begins with a feint toward a repeat of the exposition.	**(P S)** **S** coda V/VI VI I - **P**-**S** rotation intact, but **P** not in tonic before recap (Type 2). - **ESC** at m. 196.
Symphony no. 8 in G Major, op. 88	B. 163	Aug.– Nov. 1889	- abrupt prep of a clear iii:HC **MC** at m. 65 with an extensive *CF* that tries to attain a V:HC **MC** for **S**. - second MC at m. 95. It is very clear (2mm. of CF).	iii – III – iii **TM¹** **TM³** **C→RT** -deceptive resolution into **TM¹** from CF.	no →	- clear **EEC** $\hat{3}$–$\hat{2}$–$\hat{1}$ in B at m. 109. - many themes in **TMB** / **C**. - huge feint toward expo repeat at beginning of development.	**P¹** **TM¹** **TM³** I (over V-pedal) i I - clear **ESC** at m. 287.
Symphony no. 9 in E Minor, op. 95	B. 178	Jan.– May 1893	- MC is replaced by de-energizing transition prepared by ♯iv^{o7} at m. 87.	iii (g) → III (G) **S** **C** m. 91 m. 149	yes	- **EEC** at m. 149. preceded by a clear descent of $\hat{3}$–$\hat{2}$–$\hat{1}$.	**P** **S** → **C** coda i ♯iii (g♯) =♯III (A♭) - **ESC**-substitute at m. 370. - coda (m. 392) reestablishes i.

Example 3–1. continued.

Piece Name	Burg-hauser number	Date composed	Approach to **S** **MC** present?	Key(s) of **S**	Expo repeat ?	Notes **EEC** present/deformed?	Recap features **ESC** present/deformed?
String Quartet in F Major, op. 96	B. 179	June 1893	- best MC-candidate is at m. 42. - **S** begins at m. 44.	III (A)	yes	- thematic **EEC** at m. 60. - modal decay at end of expo.	**P** **S** coda I I -clear **ESC** at m. 168.
String Quintet in E♭ Major, op. 97	B. 180	Aug. 1893	- abrupt prep of iii: HC **MC** at m. 62. - dominant chord at the HC. carries a seventh and minor ninth (and is decorated by diminished octave).	iii (m. 63) → V (m. 94) **S**1.1 **S**1.2 (S^C) - no second **MC** between. iii and V (so not a TMB).	yes	- clear **EEC** $\hat{3}$–$\hat{2}$–$\hat{1}$ in B♭ at mm. 106–107. - **S**1.2 sounds like **C**-material thematically but satisfies harmonic function of **S**.	**P**^{2} **S**1.1 **S**1.2 (S^C) coda I ♭VI I - ♭VI approached by deceptive cadence. - clear $\hat{3}$–$\hat{2}$–$\hat{1}$ **ESC** (with $\hat{5}$ interpolation) at mm. 238–41.
Sonatina in G Major for Violin and Piano, op. 100	B. 183	Dec. 1893	abrupt prep of a clear vi:HC **MC** at m. 35 with a brief CF.	vi (e) ------ **S** **C** (P-referential)	yes	- clear **EEC** in E minor at m. 52.	**P** **S** I I - clear $\hat{3}$–$\hat{2}$–$\hat{1}$ **ESC** at m. 160.
String Quartet in G Major, op. 106	B. 192	Before Nov. – Dec. 1895	- Exposition is in dialog with the **TMB** type. - MC-feint at m. 21 - i:HC MC at m. 74 with quasi-modulating CF.	♭III (B♭) m. 81	no	- **EEC** in B♭ at m. 155 after an episode in B major.	**P** (but no **P**^{2}) **S** I I - Recap is radically recomposed - **ESC** at m. 364.
String Quartet in A♭ Major, op. 105	B. 193	Mar. – Dec. 1895	clear V:HC **MC** at m. 49 with chromaticized *CF*.	V (E♭) at m. 54	no →	- **EEC** at m. 68. - development begins with a feint toward a repeat of the exposition.	**P** **S** over cadential $\frac{6}{4}$ → V I - **ESC** at m. 172.

I. The Medial Caesura (MC) in Dvořák's Mature Works

All but one of the first movements of Dvořák's maturity are written as two-part expositions, the sole exception being the Piano Trio in G Minor, op. 26 (1876). Its exposition (which can be found in Appendix B) is a good example of a continuous exposition (as we might find in Haydn), in which the incorporation of P-based material is a major feature throughout. Hepokoski and Darcy's concept of a continuous exposition is at odds with William Caplin's idea that there is almost always a second theme in any sonata whether or not a medial cadence is present. Caplin states that this subordinate theme is "more than just a new melody, this theme is an integral unit of form containing a syntactical succession of formal functions and a concluding authentic cadence."[1] In Dvořák's Piano Trio in G Minor, the zone that would have been reserved for an S-theme is nothing other than a *Fortspinnung*-type texture (see the discussion of this work on pp. 209–11 below) and there is no concluding authentic cadence. This latter part of the exposition clearly does not exhibit the S-characteristics that might allow Hepokoski and Darcy to assume that a weakly articulated HC within TR has been accepted as an MC-candidate, nor does it seem to satisfy Caplin's criteria for a subordinate theme and its formal function (especially as it does not cadence).

As can be seen in the information presented in Example 3–1, however, the continuous exposition as a formal strategy was irregular for Dvořák and he abandoned it for the first movements of the remainder of his sonata cycles. Therefore, to understand the way in which Dvořák constructed his first-movement expositions, we must look for the division between its two halves, a division that is usually articulated by what Hepokoski and Darcy have described as

[1] William Caplin, *Classical Form: a Theory of Formal Functions for the Instrumental Music of Haydn, Mozart, and Beethoven* (New York: Oxford University Press, 1998), 97 and 203.

a *medial caesura*. I find this concept to be quite effective for the study of eighteenth-century sonata form, continually confirmed by analytical and experiential studies, and that it holds up well, with modifications, in nineteenth-century contexts as well. Their investigation of the medial caesura and its uses is one of the most important contributions to the recent literature on sonata form. Their definition is worth quoting in full:

> Before the non-tonic S can unfold (initiating part 2 of the exposition), a musical space for it must be opened. In Allegro compositions (rapid first movements or finales, overtures, and so on) this space cannot be entered casually. Rather, S-space must be forcibly manufactured, through a common device of structural punctuation that we term the *medial caesura* (MC). A medial caesura is usually built around a strong half cadence (in the major mode either V:HC or I:HC) that has been rhythmically, harmonically, or texturally reinforced. This caesura has two functions: it marks the end of the first part of the exposition (hence our adjective "medial"), and it is simultaneously the decisive gesture that makes available the second part.[2]

The MC in the Classical era is often articulated by a literal gap (grand pause) but it became increasingly common for composers to fill in the gap between the MC and the beginning of S with caesura-fill (CF). The gap between the MC and the beginning of S could often be several measures or more in length, filled with more extensive musical material. Yet, this space—neither TR nor S—presents a kind of stasis that Hepokoski and Darcy refer to as

[2] Hepokoski and Darcy, "The Medial Caesura and its Role in the Eighteenth-Century Sonata Exposition," *Music Theory Spectrum* 19 (1997), 121. See also chapter 3 in their *Elements of Sonata Theory*.

expanded caesura-fill.[3] In Dvořák's music, MC-gaps are often filled by some type of CF, including expanded caesura-fill; rarely do we encounter a pure silence.

As Hepokoski and Darcy readily acknowledge in *Sonata Theory*, formal divisions and sectional boundaries of nineteenth-century sonatas are often less clear than those of the Classical era. Of especial interest for us is the MC-effect that Hepokoski and Darcy refer to as a *blocked medial caesura*. They describe it thus:[4]

> In these cases the energetic TR proceeds normatively and perhaps even provides a clear structural-dominant lock on the way to what would appear to promise to be a standard MC gesture. Shortly before the expected articulation of the MC chord, however, the *forte* music seems to run into a dynamic blockage (like the hitting of a wall) perhaps on a predominant chord or perhaps with the arrival of a cadential $\frac{6}{4}$. Thus the drive to the normal MC completion is prematurely shattered in mid-phrase. At this point the dynamics will be suddenly reduced to *piano* (suggesting, perhaps a caesura-fill texture), and a bridge-like arc of music is cast forth to connect the blocked MC (the predominant or $\frac{6}{4}$ chord) to the S-theme proper. In other words, the MC-dynamic-effect is present (a sudden drop to *piano*), but that effect occurs prematurely, as though the energetic TR had been kept from its normative MC goal-chord.

They go on to say that this effect is exceptional in the decades around 1800, but it would have "telling repercussions" in the later nineteenth century. Citing the first movements of Schumann's Fourth Symphony and Brahms's Second and Third Symphonies, Hepokoski and Darcy say that a blocked (or suppressed) MC can be followed (or replaced) by a broadly expansive *de-energizing transition* that usually falls to a PAC in the new key, which itself

[3] Hepokoski and Darcy, *Elements of Sonata Theory*, 41.
[4] Ibid., 47–48.

unlocks the S-zone. By allowing their theoretical apparatus to accept a de-energizing transition (presumably taking place over several measures or more) in place of the Classically normative MC, Hepokoski and Darcy implicitly agree that the two parts of the exposition may be divided by a section (swath) of music and not just a brief gap (point).[5] In other words, given a synchronic view of the piece (or retrospective hearing), we might say that an *MC-effect* has occurred despite the severe attenuation, or absence, of the MC itself.

Attenuated MC-effects may lack the punctuating character of the Classical MC but do not interfere with the analytical division of the exposition into two main parts. That is, we will still hear a clearly defined S. Hepokoski and Darcy have stated that "if there is no MC, there is no S";[6] but, as an inverse of this formulation, if we hear a clearly defined S, we can assume that a divisive MC-effect has occurred even though the MC itself may be literally absent. This MC-effect is often based on a half cadence somewhere in TR; in this case, Hepokoski and Darcy allow that "although the HC MC-effect is weak, S is nevertheless presented as though it were accepting that HC-arrival as a workable MC."[7] We might classify such MC-effects along a spectrum with a Classically normative MC (complete with grand pause) on the one hand and a de-energizing transition on the other, with deformations or blockages of the medial caesura between the two extremes; see Example 3–2 below for a graphic representation of this MC spectrum.

It is not surprising that Dvořák's medial caesuras, when he uses them, tend toward the more complicated side of the MC spectrum. His sonata-form compositions, as characteristic representatives of a later nineteenth-century sonata style, incorporate several types of MC and

[5] One is reminded of the similar way that, at the beginning of the twentieth century, atomic physicists shifted from their conception of the electron as a defined point in orbit around the nucleus (according to Newtonian mechanics) to an uncertain location in a cloud of probability (according to quantum mechanics).
[6] Hepokoski and Darcy, 117.
[7] Hepokoski and Darcy, 47. On pp. 131–145 they discuss what constitutes a viable, stylistically normative S.

CF complications. These complications can be labeled according to the following characteristics:

1) **Abbreviated preparation**. The MC seems to appear abruptly, without adequate preparation, but leads to a satisfactory S. Abbreviated preparation is distinct from the proportionally premature HC that introduces a trimodular block (TMB), as in Beethoven's Piano Sonata in F Major, op. 10 no. 2.

2) **Textural continuation**. Caesura-fill is characterized by the perseverance of thematic and/or accompanimental elements of TR beyond the MC-point and invites the listener to believe that the music has not yet left the TR. It may sometimes be difficult to distinguish this effect from the *de-energizing transition*.

3) **Chordal extension.** Identified by the addition of a seventh (or even ninth) to the MC. Cadences are by definition points of repose. In Classical-era works they are typically triads, since sevenths or ninths are too unstable to provide a sense of rest. Like textural continuation, chordal extension problematizes the MC and may sometimes be difficult to distinguish from the *de-energizing transition.*

4) **Medial-caesura feints**. A proposed candidate for the MC almost immediately gives way to the true MC, although the latter MC-candidate may be problematic in some way.

5) **Modulating caesura-fill.** There are two main subtypes of this technique:

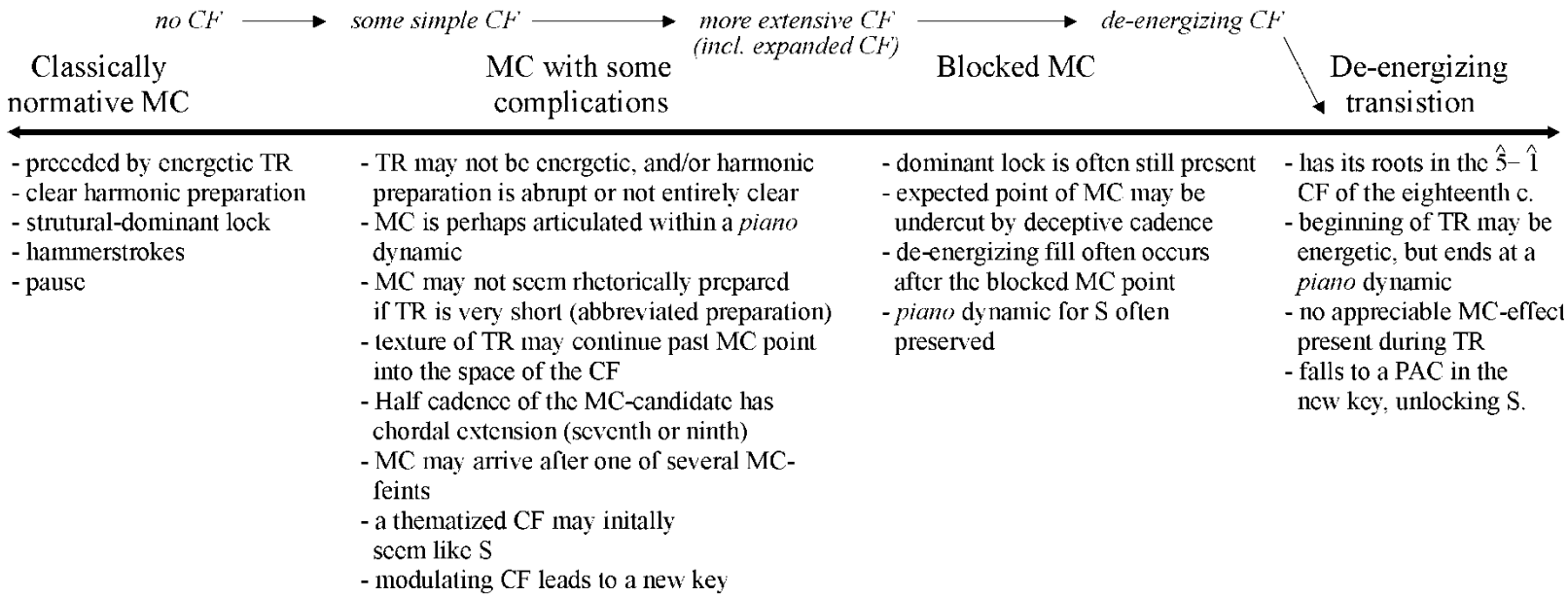
   Type 1 – CF leads to a new key area that was not implied by the MC and S begins in the new key supplied by the modulating CF.
   Type 2 – CF attempts to modulate after the MC. In contrast with Type 1, S rejects the new key suggested by the Type 2 modulating CF and accepts instead the key proposed by the MC.

6) **De-energizing transition**. This is an MC replacement. It typically derives from the $\hat{5}$–$\hat{1}$ caesura fill type. It is usual for a middleground melodic line to descend to a PAC in the new key, which unlocks the S-zone.

It is important to note that the de-energizing transition still properly belongs within a discussion of the medial caesura since it replaces the MC within an exposition divided into two halves, the second of which is clearly second group (S-zone plus C-zone). This is unlike the case of the continuous exposition, which also lacks a medial caesura but in which no S can be said to occur. The continuous exposition exists as a separate formal strategy set apart from those that employ the MC-effects found along the continuum of Example 3–2.[8] Many of Dvořák's transitions prepare, or obscure, the MC with some combination of the above techniques, but I will try to present examples of the concepts with pieces that best exemplify their respective techniques.

[8] For a more in-depth examination of the continuous exposition in the Classical era, see chapter 4 of Hepokoski and Darcy, 51–64.

Example 3–2. A spectrum of MC-effects, especially with respect to later nineteenth-century music. These MC characteristics are discussed by Hepokoski and Darcy in *Elements of Sonata Theory* (esp. pp. 24–50)



Abbreviated preparation

Rather than complicating the MC-moment itself, abbreviated preparation creates the sense of a proportional imbalance. The MC seems to appear too abruptly, seemingly without adequate preparation. It does, however, lead to a satisfactory S. Abbreviated preparation is unlike the proportionally premature HC that introduces a trimodular block (TMB), as in Beethoven's Piano Sonata in F Major, op. 10, no. 2, because there is only one MC-moment, not two as in a TMB.

Dvořák's String Quartet in E Major, op. 80 (1876),[9] is a good example of abbreviated preparation. The P-based transition that begins at m. 38 is relatively short (ten measures), possesses the increase in energy that is typical of TR, is built around expanding chromatic wedges (see Example 3–3a), and leads to the vi:HC MC via a French-sixth-type chord. Yet for all that, the arrival of the MC seems abrupt, especially in contrast with the leisurely pace of the opening P-zone, whose expansiveness comprises both tonic presentation and a tonally excursive anticipation of the theme and tonality of the S-zone.[10]

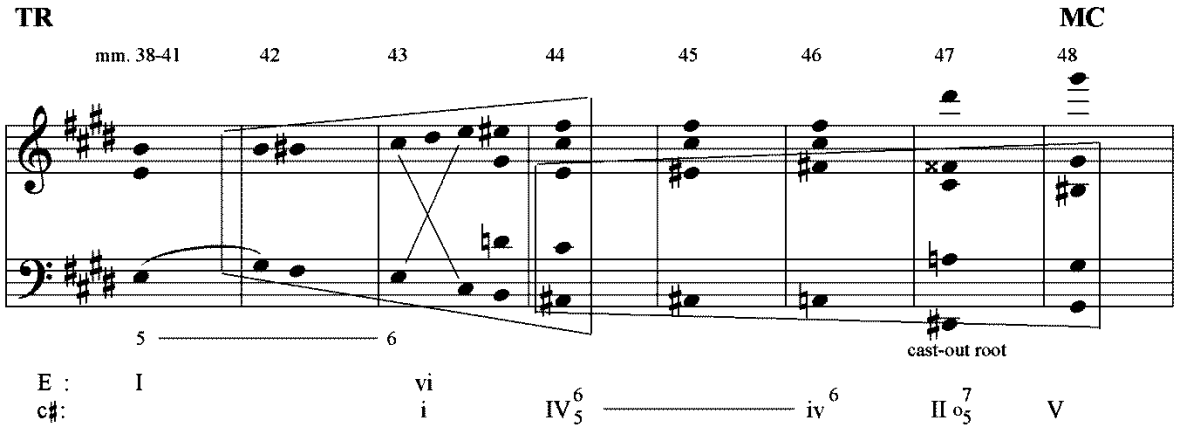
The brief, two-measure caesura-fill (CF) helps smooth over the MC point; it is representative of the $\hat{5}$–$\hat{1}$ fill type (although here the $\hat{1}$ is elided, as shown in the second violin of Example 3–3b) and has a contracting chromatic wedge that balances the expanding one that led to the MC. Because the appearance of the S-zone is proportionally appropriate with respect to

[9] Originally op. 27, this quartet remained unpublished until Dvořák revised it and sent it to Simrock in 1888; hence the high opus number that does not correspond to the date of composition.
[10] Indeed, the first four measures of TR are harmonically static, leaving only six to accomplish the modulation. Compare this TR to that of Dvořák's Violin Sonata in F Major, op. 57, which lasts over twenty measures.

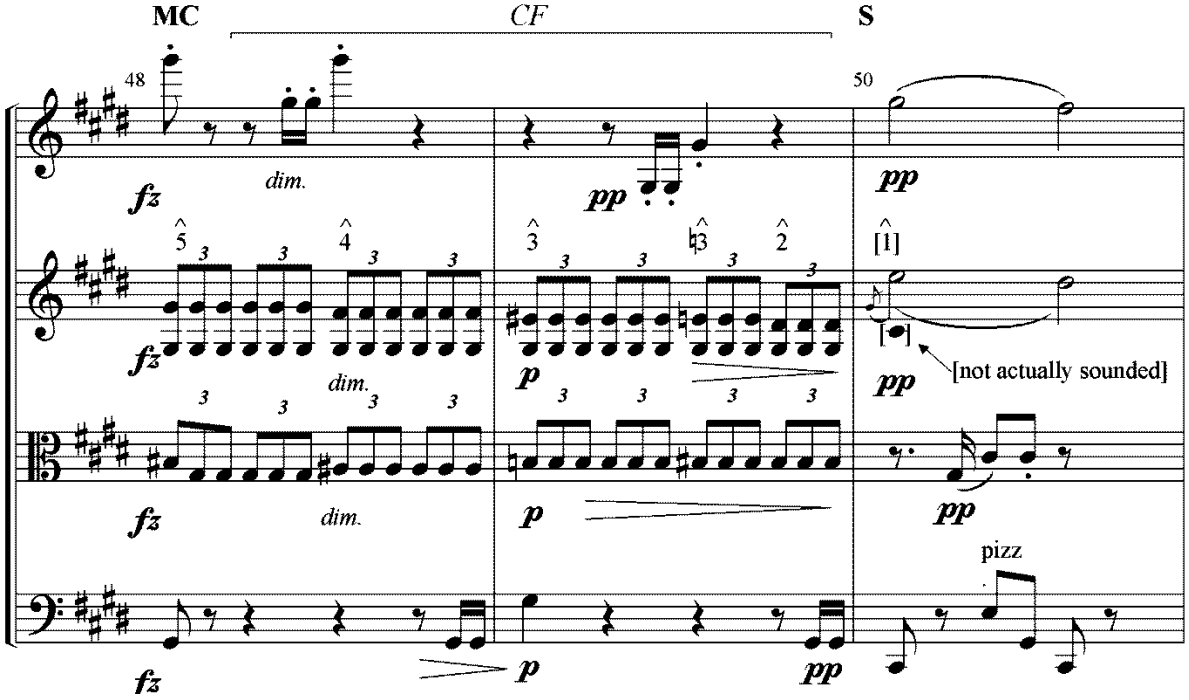
the length of the exposition, it is easy in retrospect to accept the abruptly prepared MC as the true MC.[11]

Example 3–3.

a. String Quartet in E Major, op. 80, mm. 38–48, i. TR to MC, chromatic wedges boxed.



b. String Quartet in E Major, op. 80, i, mm. 48–50, caesura fill of the $\hat{5}$–$\hat{1}$ type.

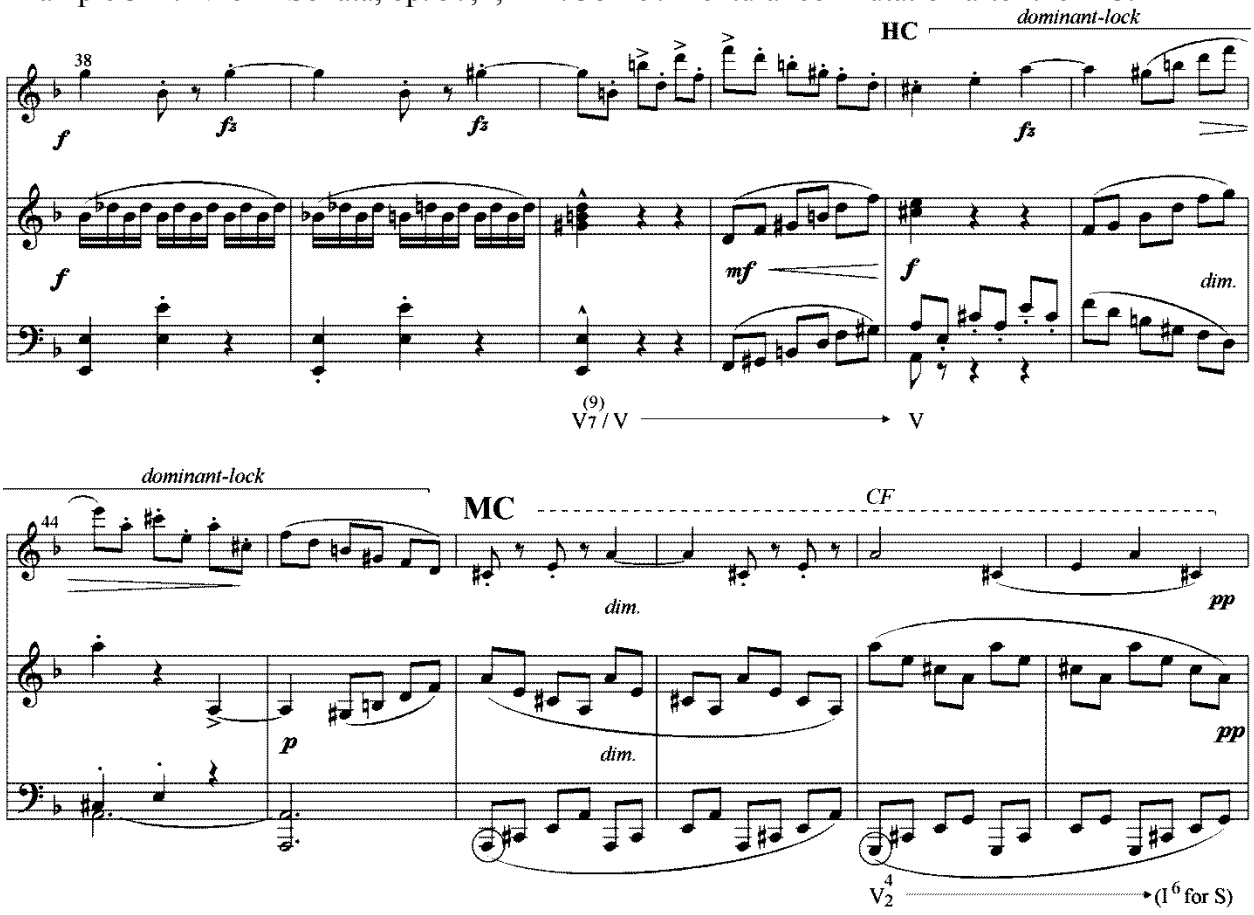


[11] S begins in m. 50, 54% of the way through the exposition (92 measures long). For the normal range of S-beginnings—which can range anywhere from about 15% to 70% of the way through the exposition depending on the type of MC involved—see Hepokoski and Darcy, "The Medial Caesura," 126– 27.

Textural Continuation

The Violin Sonata in F Major, op. 57 (1880), shown in Example 3–4 (refer also to Examples 4–4 and 4–5), is a good example of the MC-masking technique of textural continuation. Here, an energetic TR begins in m. 35 and culminates with a clear and forceful vi:HC in m. 42. The energy built up by the transition begins to dissipate during the dominant-lock, however, dropping to *piano* by the time the MC arrives in m. 46. This arrival, though signaled by the harmonically static arpeggios in the piano, is masked by the textural continuation in the violin and the *piano* dynamic. Slower note values in the violin and the harmonic progression from root-position dominant to a V^4_2 in mm. 48–49 are indicators of CF-space.

Example 3–4. Violin Sonata, op. 57, i, mm. 38–49. Textural coninutation after the MC.

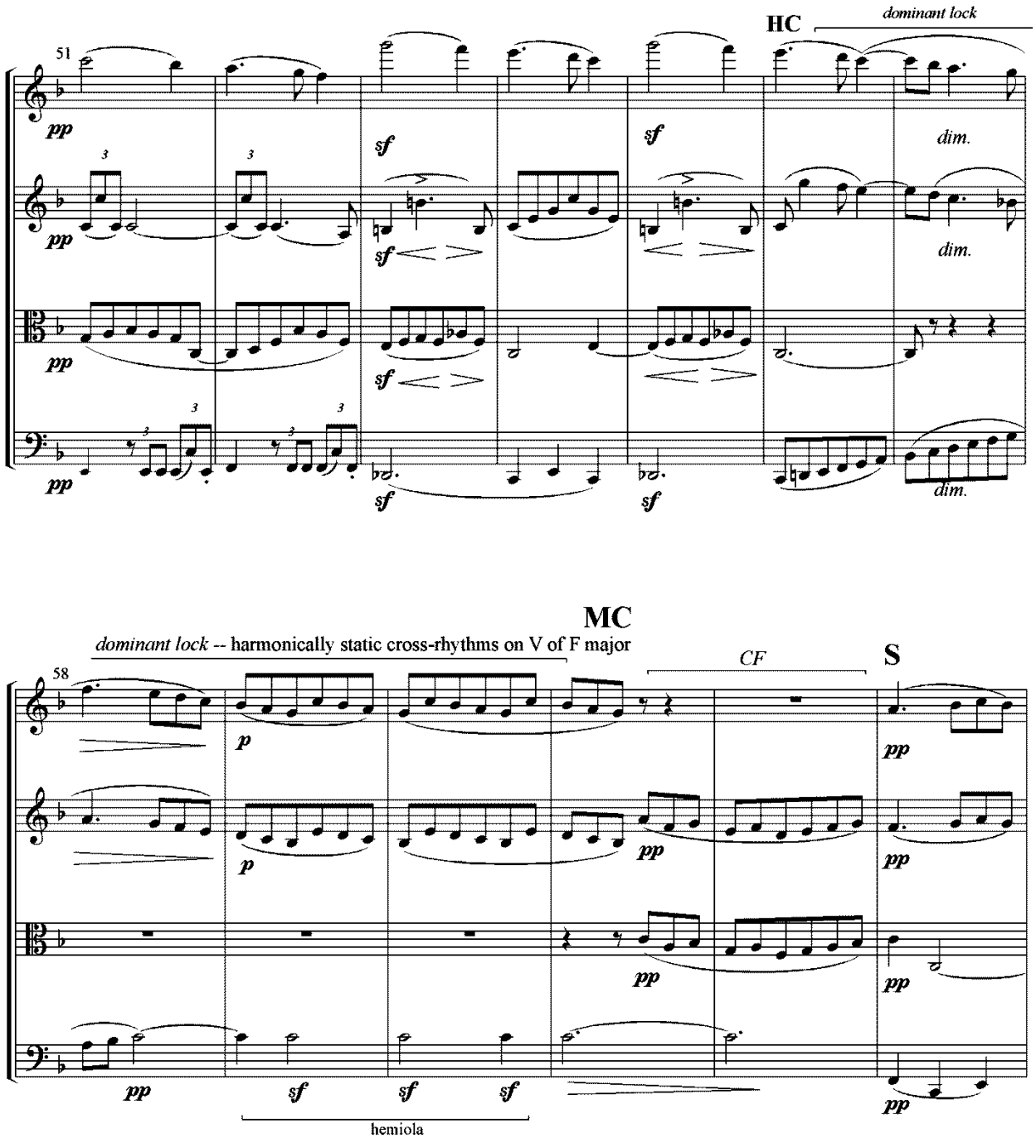


In spite of these generic MC markers, the MC of the Violin Sonata is not entirely clear. It is masked by the continuation of the thematic content of the transition (although this content is liquidated to the point of simple arpeggiation by the end of the caesura-fill) and the unceasing stream of steady eighth notes.

Another example of an MC problematized by textural continuation can be found in the String Quartet in D Minor, op. 34 (1877). It follows a similar harmonic model as the op. 80 quartet in that both quartets have a P-based TR that leads to an augmented-sixth-type sonority preparing the MC. In the case of op. 34, however, the approach is more broadly paced (thus not an abbreviated preparation) and less energetic: the dominant-lock that begins at the III:HC in m. 56 arrives at a *pianissimo* dynamic and gets quieter (see Example 3–5). This dynamic is not typical of the Classical MC, which is typically built around a forceful half-cadence; the dominant-lock, if it is present, drives aggressively toward the MC articulation.[12] Several factors allow us to place the MC at the beginning of m. 61, including the rhythmic resolution of the hemiola and ensuing cessation of motion in the cello and the beginning of the rest in the first violin.[13] The second violin and viola continue the steady eighth-note texture of the preceding dominant-lock through the CF (mm. 61–62). Although the melodic pattern is slightly changed for the lead in to S, the continuation of the basic texture of the dominant-lock smooths over the articulation of the MC.

[12] Hepokoski and Darcy, *Elements of Sonata Theory*, 24.
[13] There is a visual cue to this MC point: live audiences will see the first violinist stop playing here.

Example 3–5. String Quartet in D Minor, op. 34, i, mm. 51–63. Textural continuation after the MC.



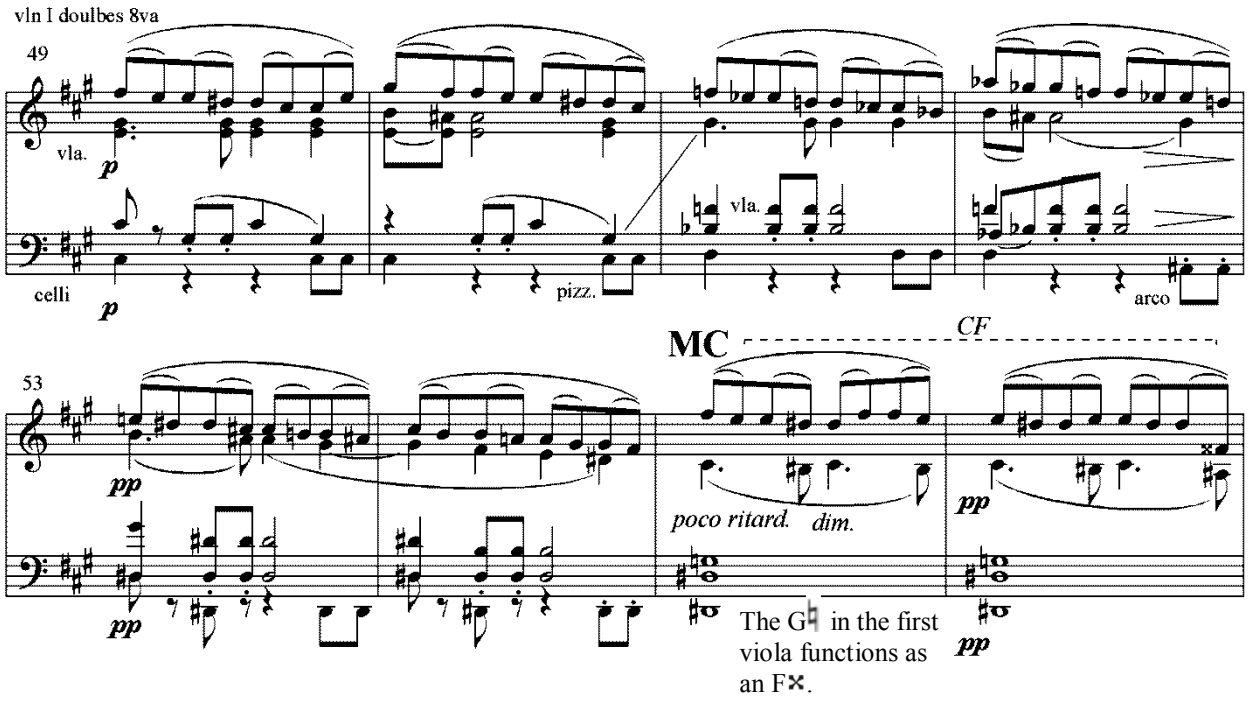
Chordal extension and the problem of the de-energizing transition.

An example of abbreviated preparation and textural continuation, the MC in the String Sextet in A Major, op. 48 (1878), is even more obscured than that of the op. 34 quartet (see Example 3–6). Moreover, this MC is modified by chordal extension; that is, it carries a seventh and a ninth. The P-based TR, beginning at m. 40 over a dominant pedal point, leads to C♯ minor (the parallel major being the eventual goal of the S-zone) at m. 49, at which point a liquidation of the theme begins. From there, a chromatic ascent in the bass from C♯ to D♯ leads to a D♯ dominant minor-ninth chord in m. 55; this is the best candidate in this exposition for the MC. The addition of a seventh (let alone a ninth) jeopardizes the identification of this point as a cadence, however, since cadences, even half cadences, tend to be triads rather than seventh (or ninth) chords. Certainly the harmonic instability of what I have called S could provide an argument against identifying m. 55 as an MC-candidate.

Indeed, failed medial caesuras will often lead to an unsatisfactory or problematic launch of the S-theme, opening the door to a more solid, viable MC later on. That, however, does not happen in this work; there is no later point even remotely acceptable as a second MC-candidate. Factors that support m. 57 as the true beginning of S-space include the *poco ritardando* accompanying the MC, the diminuendo to *pianissimo*, the clear thematic and tonal contrast with the opening phrase of S, and the way that this same material appears in the recapitulation transposed a fifth lower. As with the op. 34 quartet, the manner in which the music falls to a PAC in the new key could lead to an interpretation of this whole passage as a de-energizing transition. A few features, however—such as the harmonic and rhythmic stasis of the lower voices and the *poco ritardando*—call our attention to mm. 55–56 as something subtly different

from the foregoing TR material. Thus, though weakly articulated and masked by chordal extensions, the MC is present and divides the exposition into two halves.

Example 3–6. Piano reduction of String Sextet, op. 48, i, mm. 49–56. MC with chordal extension. Lower voices harmonically and rhythmically static after the MC-point.

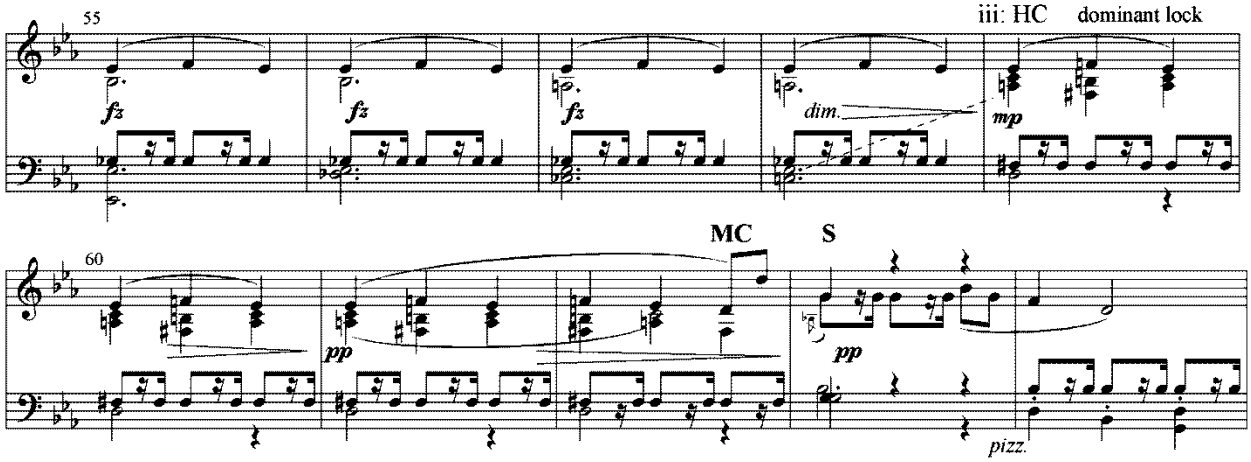


Because the sextet is an analytically difficult case, especially with regard to the unstable nature of its S, it can be productively compared to the Piano Trio in G Minor, op. 26 (1876), which entirely lacks a medial caesura. The score in Appendix B can be used for the following discussion. In the trio, TR begins at m. 32 with a counterstatement of P.[14] The texture thins dramatically in m. 50, suggesting that a formal junction is imminent. At m. 61 a dominant seventh on G♭ resolves enharmonically as an augmented sixth to a cadential six-four of B♭

[14] This is a good example of Dvořák's use of *Mehrdeutigkeit*. The B♭ major chord that starts TR is locally heard as a tonic resolution of the F^7 in m. 31. Since it is immediately followed by vii^{o4}_3 of G minor, however, we retrospectively understand that TR began on the mediant of G minor.

major, the normative III, suggesting that we have just heard a de-energizing transition without MC. The new theme of the potential S-zone is aborted by unceasing modulations, however, and we begin to understand the strategy as what Hepokoski and Darcy call the TR → FS (*Fortspinnung*) continuous exposition type (the arrow is read "becomes"). The continuous nature of the exposition becomes especially apparent when P-based material returns as part of the *Fortspinnung* at m. 82. (While it is true that P-based material sometimes returns as part of a post-EEC closing module, there is not actually an EEC in this piece; see pp. 209–211 below.)

Example 3–7. Piano reduction of the String Quintet in E♭ Major, op. 97, i, mm. 55–64. The MC is complicated by abbreviated preparation and chordal extension.



The exposition of the String Quintet in E♭ Major, op. 97 (1893), is similar to, but clearer than, that of the Sextet. It also has an MC that is complicated by abbreviated preparation and chordal extension. The iii:HC at m. 59 arrives abruptly (see Example 3–7): although the bass of TR begins a descent through the minor tetrachord, E♭–D♭–C♭, in m. 55, the dominant of E♭ is never reached; rather, a reversal of the bass-line melodic motion from C♭ to C♮ leads to D♮, the dominant of G minor, in only two measures. A further parallel with the Sextet is that the

Quintet's half cadence also has an added seventh (as well as a lengthy minor-ninth suspension that is decorated by a minor tenth). The MC-moment itself is only articulated by the slight pattern change in m. 62 that resolves the minor ninth of the half cadence into a simpler dominant seventh. G minor is then seamlessly integrated into the B♭ major (V) that ends the exposition.[15] Also like the Sextet, an argument could be made for the identification of the entire passage as a de-energizing TR without MC, but the harmonic stasis, diminishing dynamics, and melodic repetitions of mm. 59–62 create a sense of repose here (despite the chordal extensions).

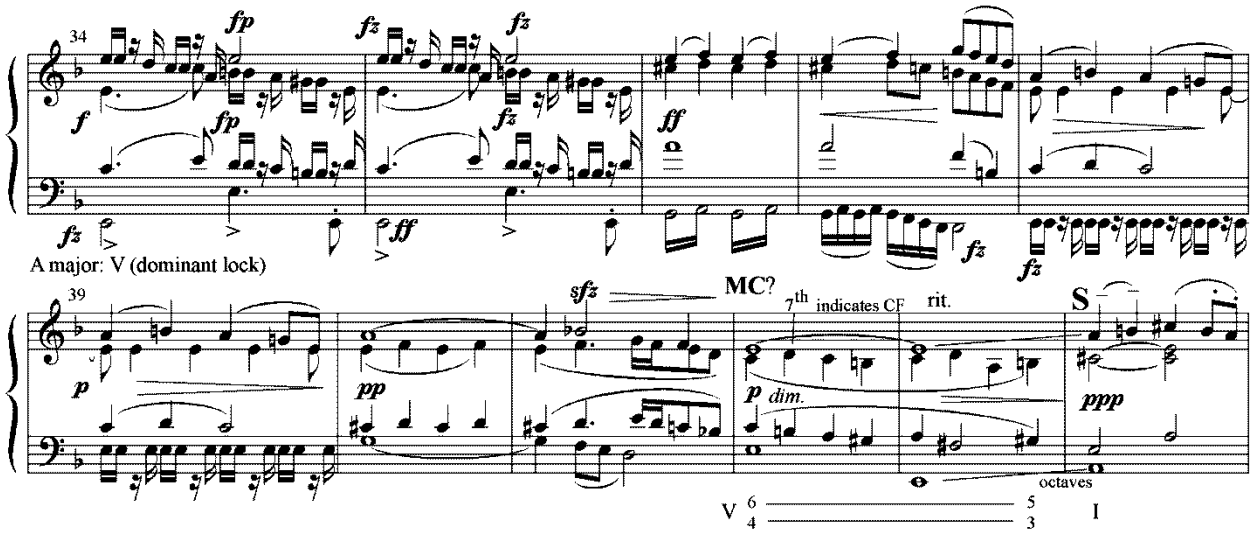
Compare the above pieces (opp. 34, 48, and 97) with the String Quartet in F Major, op. 96, "American" (1893). Like those pieces, this one flirts with a de-energizing transition but ultimately projects an MC-effect (see Example 3–8). TR begins at m. 11, eventually leading at m. 26 to a half cadence in A minor. A secure dominant lock is achieved by m. 34, although it is possible to hear it beginning as early as m. 26. The best MC-candidate is m. 42, even though the dominant here is decorated by a cadential six-four (the introduction of the chordal seventh would then be indicative of the onset of CF).

Performance will influence our interpretation of mm. 43–44. If, for example, a large amount of *ritardando* is taken and there is a clean break between mm. 43 and 44 (especially in the first violin), we will likely interpret the chord at m. 42 as the half cadence and m. 44 as the beginning of a new phrase, the S-launch. If the *ritardando* is only lightly observed and the texture is unbroken, we may instead hear a PAC at m. 44, thus interpreting the passage as a de-energizing TR that dovetails with the onset of S. If the latter interpretation is chosen, one will hear parallel octaves in the outer voices which, while not impossible, would be noteworthy. Like

[15] Rosen might argue that this seamless integration is the result of the Romantic sensibility that allegedly treats major and its relative minor as the same key. See his discussion of Schumann's Piano Sonata in F♯ Minor in *Sonata Forms*, 368–92.

so many nineteenth-century cadences, this one is blurred, although I am inclined to hear an MC-effect at m. 42.

Example 3–8. String Quartet in F Major, op. 96, i, mm. 34–44. MC-identification will be influenced by the performance of mm. 42–43.



As a contrast to the prior examples, all of which might be read as having a medial caesura no matter how masked or problematic, the Symphony no. 9 in E Minor, op. 95, "From the New World" (1893), is a good example of a de-energizing transition that replaces the potential MC-point, creating a much more fluid and connected form. At this point, we should remind ourselves of the distinction between a sonata exposition with a de-energizing transition, which is still divisible into two halves, and a continuous exposition, which is not. As I discussed above on pp. 158–59, Hepokoski and Darcy address this issue in several places in *Elements of Sonata Theory*, especially their subsection "Troubleshooting MC Identifications" on pp. 48–50.[16] The

[16] They discuss the blocked MC on p. 47, the "incipient or not-fully-realized" MC on p. 63 (within the discussion of the continuous exposition), and the stylistic norms of S on pp. 131–45.

exposition of Dvořák's Ninth Symphony belongs to a class of situations in which a clear S is not preceded by a literal MC. Indeed, the S-zone of Dvořák's symphony—here reminiscent of the "bustling S" variety—does not even follow a strong half cadence within TR.[17] From the onset of TR at m. 59, there is no hint at a half cadence. Rather, after a series of descending fifths TR seems to stall on ♯iv^{o7} at m. 77, beginning a long *diminuendo* into the bustling, *piano* launch of S in G minor at m. 91.[18] Compare this case to that of the op. 96 quartet, in which the V^7 chord immediately preceding S can be heard as the HC around which the weakly articulated MC is built. On a moment-to-moment basis, then, the Ninth Symphony seems to express a continuous exposition. The clear cut nature of the following S speaks against such a reading, however, and we must therefore accept that the MC-effect of this piece has been totally replaced by a de-energizing transition that, while itself smooth and continuous, nevertheless divides the exposition into two parts.

Medial caesura feints.

The medial caesuras of the String Quartet in C Major, op. 61 (1881), and the Piano Trio in F Minor, op. 65 (1883), both have caesura-fill that transform a half cadence into an

[17] In the case of a half cadence somewhere in TR, Darcy and Hepokoski write that "although the HC MC-effect is weak, S is nevertheless presented as though it were accepting that HC-arrival as a workable MC," *Elements of Sonata Theory*, 48. With regard to the "bustling S" Hepokoski and Darcy write on p. 132 that "occasionally such 'stylized' themes begin with a *forte* impulse; more typically, they begin *piano* but may contain a few edgy outbursts of *forte*. In virtually all cases the expressive effect is that of the opening's high energy continuing into the exposition's part 2, a retained sizzle of excitation now only barely constrained under *piano* wraps and eager to erupt again into *forte*."

[18] The strategy of beginning the second group of a minor-mode sonata in iii instead of III can be found in Beethoven's *Pathétique* Sonata, op. 13.

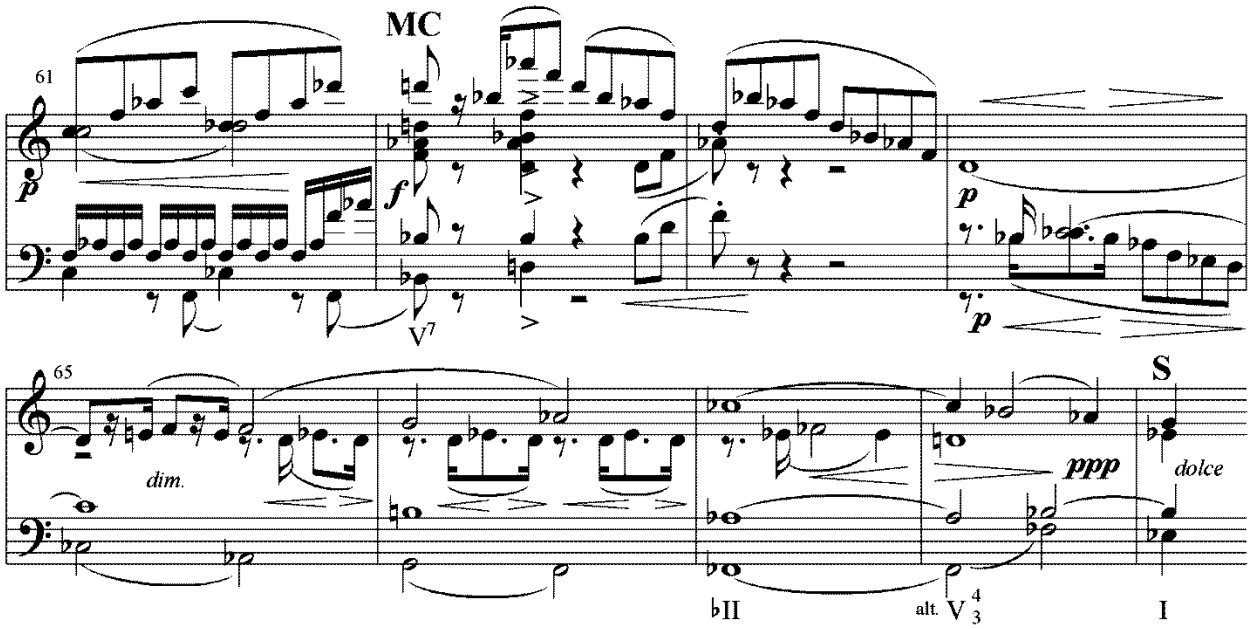
augmented-sixth ($\flat\hat{2}$–$\natural\hat{7}$) preparation for the ensuing S-zone; see Example 3–9.[19] The op. 61 quartet presents its unproblematic ♭III:HC MC at m. 62; it is a clearly understood, forceful MC-gesture, which is followed by a generically normative CF that dynamically decays to the *piano* launch of S at m. 69. The main point of interest here is the augmented-sixth chord (mm. 67–68), which threatens to turn E♭ into a dominant without actually doing so. The case of the op. 65 trio is more complicated, as there is a strong medial caesura feint. Beginning at m. 47, there is the suggestion of a dominant-lock forecasting the normative III:HC MC that is proposed at m. 50 (see Example 3–9b). Instead of accepting this candidate for the MC, however, the music very quickly settles a fifth lower on a VI:HC MC at m. 53. Although the *pianissimo* dynamic in op. 65 undercuts typical MC-rhetoric (that is, forceful gestures such as hammerstrokes), other textural cues indicate that this is true MC, such as the sudden textural change (absence of strings), the immediate augmentation of the rhythm, and the *ritardando* into the S-zone.

In this same vein, we can understand that the "double" MC of the String Quartet in E♭, op. 51, is a type of MC-feint (discussed at length in the next chapter on pp. 251–56 and shown in Examples 4–1, 4–2, and 4–3). In this case, the initial vi:HC MC-gesture at m. 35 is immediately overwritten by the normative V:HC MC in m. 36. This second MC, though, is not as strong as the first, as if the music had already expended its energy trying to achieve the first MC and only resignedly admits the second.

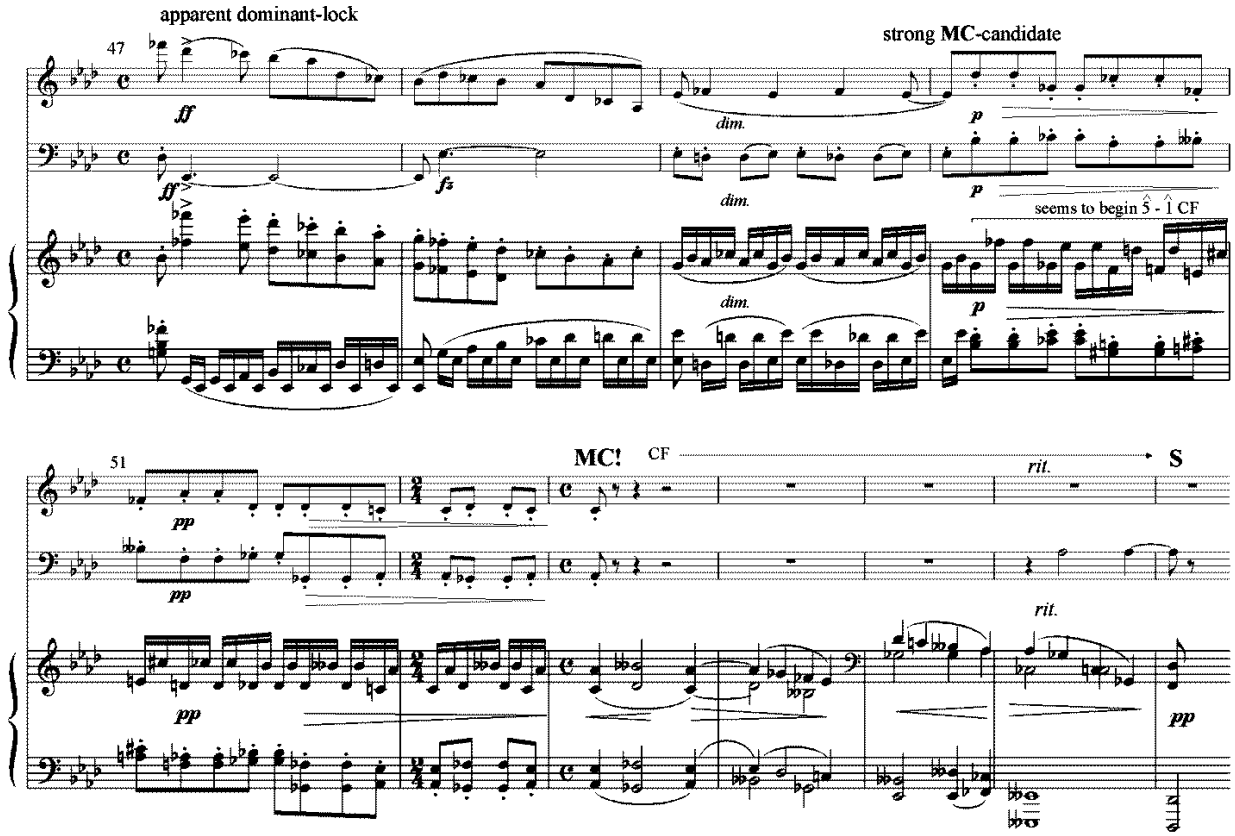
[19] Compare these works to those, such as the opp. 80 and 34 Quartets, in which the augmented sixth prepares the MC, not S. Many editions of the Piano Trio in F Minor count the anacrusis as a measure, resulting in measure numbers that are too high by one.

Example 3–9.

a. Score reduction of String Quartet in C, op. 61, i, mm. 61–69. CF terminates with an augmented-sixth chord.

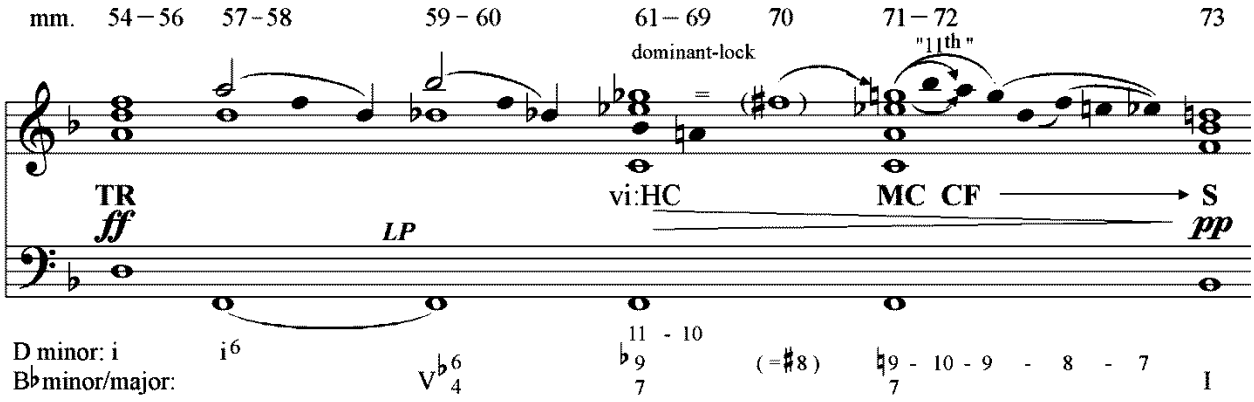


b. Piano Trio in F Minor, op. 65, i, mm. 47–57. CF terminates with an augmented-sixth chord.



The final example of an MC-feint comes from the Seventh Symphony, op. 70 (1885), which also has an abbreviated preparation of its structural half-cadence. Dvořák begins TR with a *fortissimo* counterstatement of P, but immediately moves from i to i^6. In a masterful stroke of parsimonious voice-leading, he moves from i^6 to the cadential six-four of B♭ minor (see Example 3–10), which quickly leads to a forceful vi:HC at m. 61, decorated by a minor ninth and 11–10 suspension. Although the brief sixteenth-note grand pause at m. 61 qualifies as a candidate for the MC-point, we soon realize that it is rejected in favor of a section of dominant-lock. This dominant-lock not only resolves the suspended eleventh of the vi:HC but reinterprets G♭, the minor ninth, as F♯, an ascending appoggiatura leading to G♮. Thus, the true MC at m. 71 is more aptly described as a VI:HC MC.[20] It is this now-major V^9 (becoming V^7 in m. 72) that prepares the launch of S in B♭ major. The minor six-four of m. 59 in TR is not merely gratuitous chromatic decoration, however: it forecasts the surprising close of the exposition in B♭ minor.

Example 3–10. Seventh Symphony, op. 70, i, mm. 54–73, harmonic reduction.



[20] A Classical analog to Dvořák's MC-implication of vi instead of VI can be found in Mozart's Piano Sonata in F Major, K. 332, in which the MC implies that S will launch in v rather than V. In the case of this Mozart sonata, there is no CF or corrective dominant-lock, so the ensuing S has a much stronger Picardy-third effect than in Dvořák's symphony.

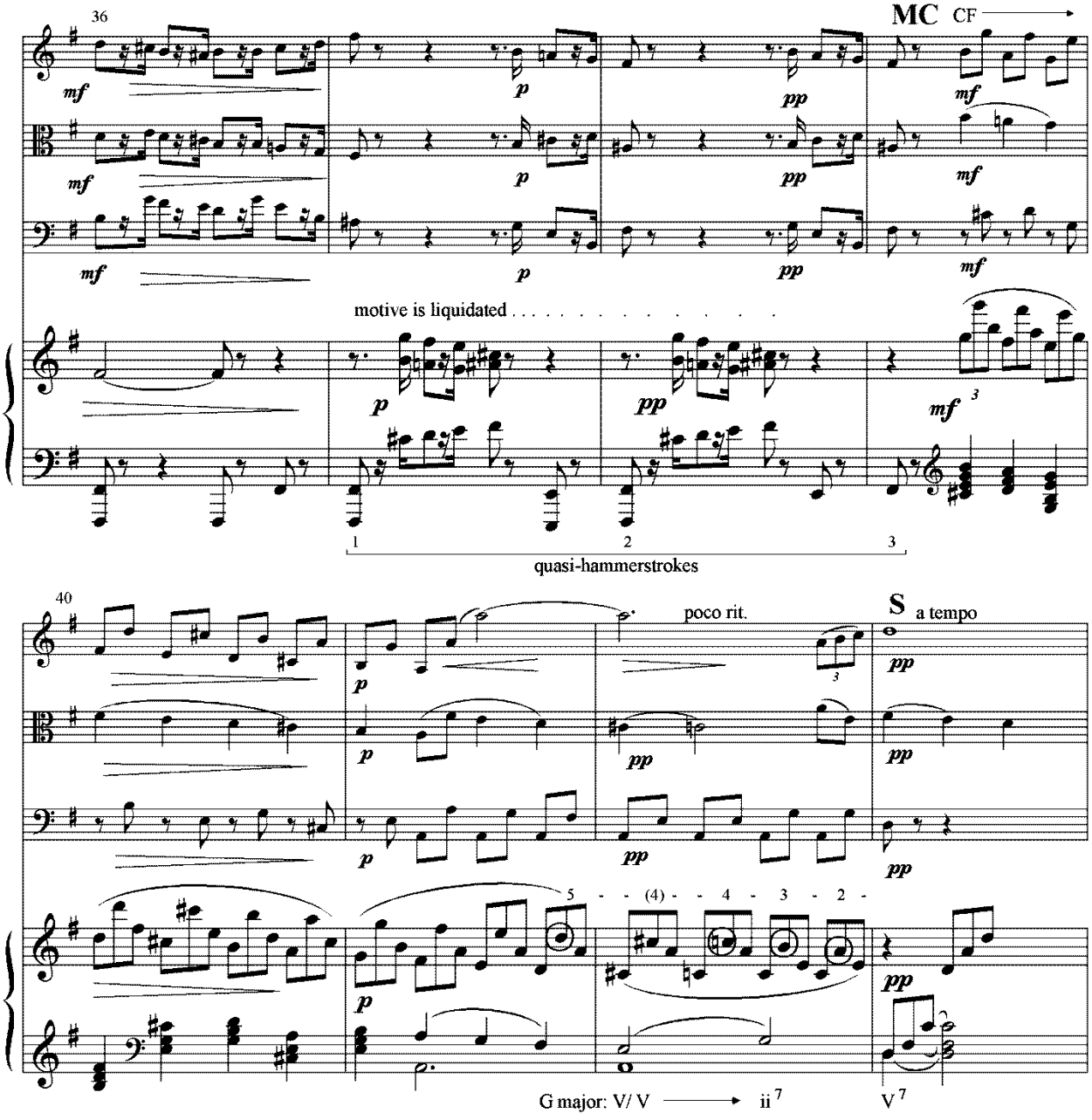
Modulating caesura-fill.

As mentioned above, a Type 1 modulating caesura-fill is one that leads to a new key for S after the MC. That is, S rejects the key proposed by the MC and opts for the new one supplied by the modulating CF. A Type 2 modulating CF, on the other hand, is one that attempts to modulate to a new key; but in this case, S rejects the attempt, opting instead to accept the key initially proposed by the MC.

The Piano Quartet in E♭ Major, op. 87 (1889), is an interesting case and a fine example of a Type 1 modulating CF. The P-based TR begins at m. 26 and arrives on the dominant of B major/minor (an enharmonic spelling of V of ♭VI) at m. 33. Motivic liquidation in mm. 37–38 and a triple-hammerstrokes gesture in the left hand of the piano are textural cues for the ♭VI:HC MC that occurs at m. 39, clearly articulated by an eighth-rest in all voices; see Example 3–11.

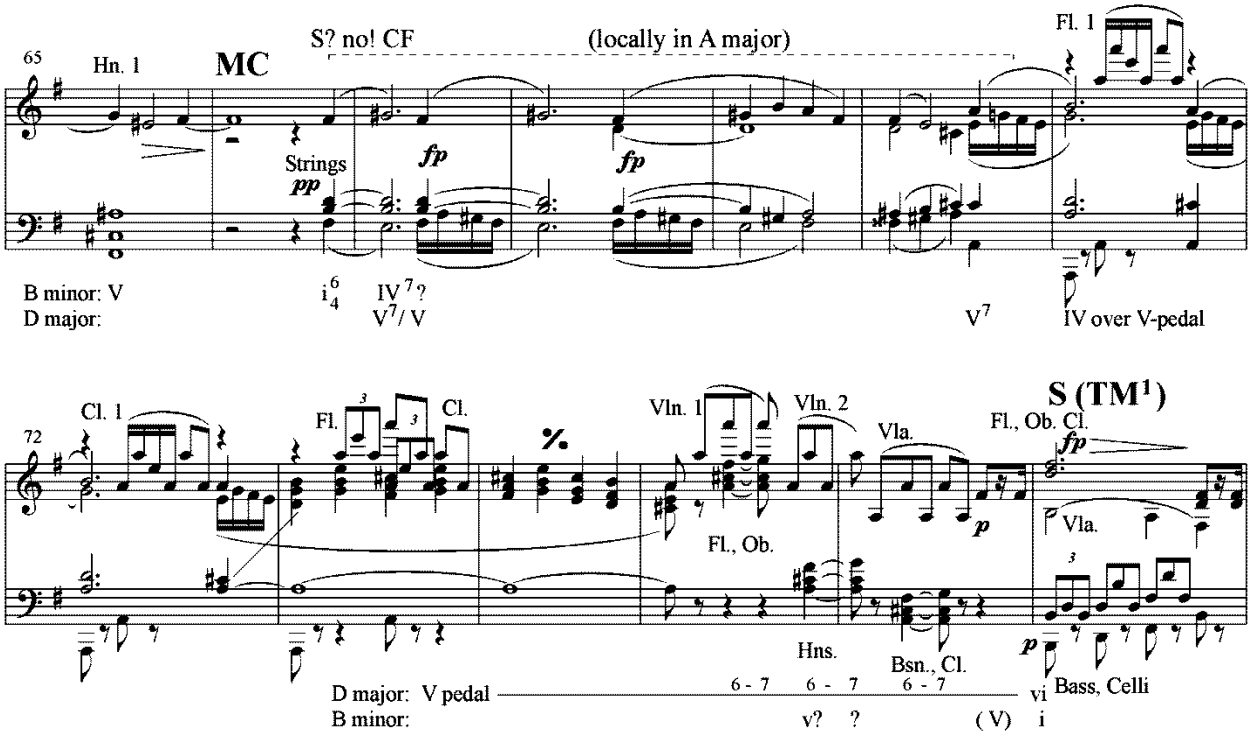
The CF then leads away from the ♭VI proposed by the MC to the supertonic seventh-chord of the key G major (III), the true key of S, which then begins on its own dominant. Thus, the end of this Type 1 modulating CF acts, in a way, like the latter part of a de-energizing transition (complete with the $\hat{5}$–$\hat{1}$ CF-gesture; see m. 42) in that it leads directly into S without textural punctuation. It is typical of Dvořák to ensure that there is still a relationship between the unrealized harmonic implication of the MC and the ensuing key area; the G major of the S-zone is a long-range deceptive resolution of the ♭VI:HC.

Example 3–11. Piano Quartet in E♭ Major, op. 87, i, mm. 36–43. CF modulates from ♭VI: HC MC to G major, the true key of S.



The first MC of the first movement of the Eighth Symphony, op. 88 (1889), is a good example of both abbreviated preparation and the Type 2 modulating CF.[21] The clear iii:HC MC at m. 65 is abruptly prepared. TR, beginning at m. 57, is only ten measures long; more to the point, TR contains only two harmonies, each of which is only slightly elaborated. The G-major harmony of the P-counterstatement is suddenly transformed to a cadential six-four on B minor through the ***L*** transformation. After the generically normative general pause (save for the sustained horn note), the new thematic material of the ensuing CF might at first be taken for S. In retrospect, however, it clearly fulfills the role of a Type 2 modulating CF, one that valiantly tries to steer the harmonic trajectory toward the Classically normative dominant (see Example 3–12).

Example 3–12. Piano reduction of Symphony no. 8, i, mm. 65–77. CF threatens to modulate to V, but does not actually do so.



[21] Recall that the Type 2 modulating CF attempts to change keys after the MC. S rejects this attempt, however, and accepts instead the key initially proposed by the MC.

The onset of the second group (actually TM^1 of a trimodular block) in the key of B minor is only surprising at the local level, where it sounds like a deceptive resolution of the A^7 that terminates the CF. In reality, Dvořák has masterfully prepared B minor by its own half-cadence while dramatizing its arrival by his employment of the Type 2 modulating CF.

It may sometimes be difficult to differentiate between a thematically based modulating CF, like the one in the Eighth Symphony, and what Hepokoski and Darcy refer to as a preparatory module to the S-zone, a module they refer to as S^0 or $S^{1.0}$ (where the S^0 designation refers to a stronger, more separable effect). These introductory modules often consist of "an accompanimental figure, vamp, or rhythmic stream that is laid down in advance of the S-theme proper."[22] Additionally, Hepokoski and Darcy describe a case, deserving of the zero-module designation, in which S^0 is sounded as a preparatory gesture over a post-MC dominant pedal. A thematized modulating CF, on the other hand, will by definition be more unstable harmonically and therefore probably unsuitable for identification as a module of S. Furthermore, in a retrospective hearing, a modulating CF should seem thematically unrelated to the following S; if there are strong hints of the S to come, it may more properly be identifiable as a zero-module of the S-zone. Clearly, there is room for ambiguity here.

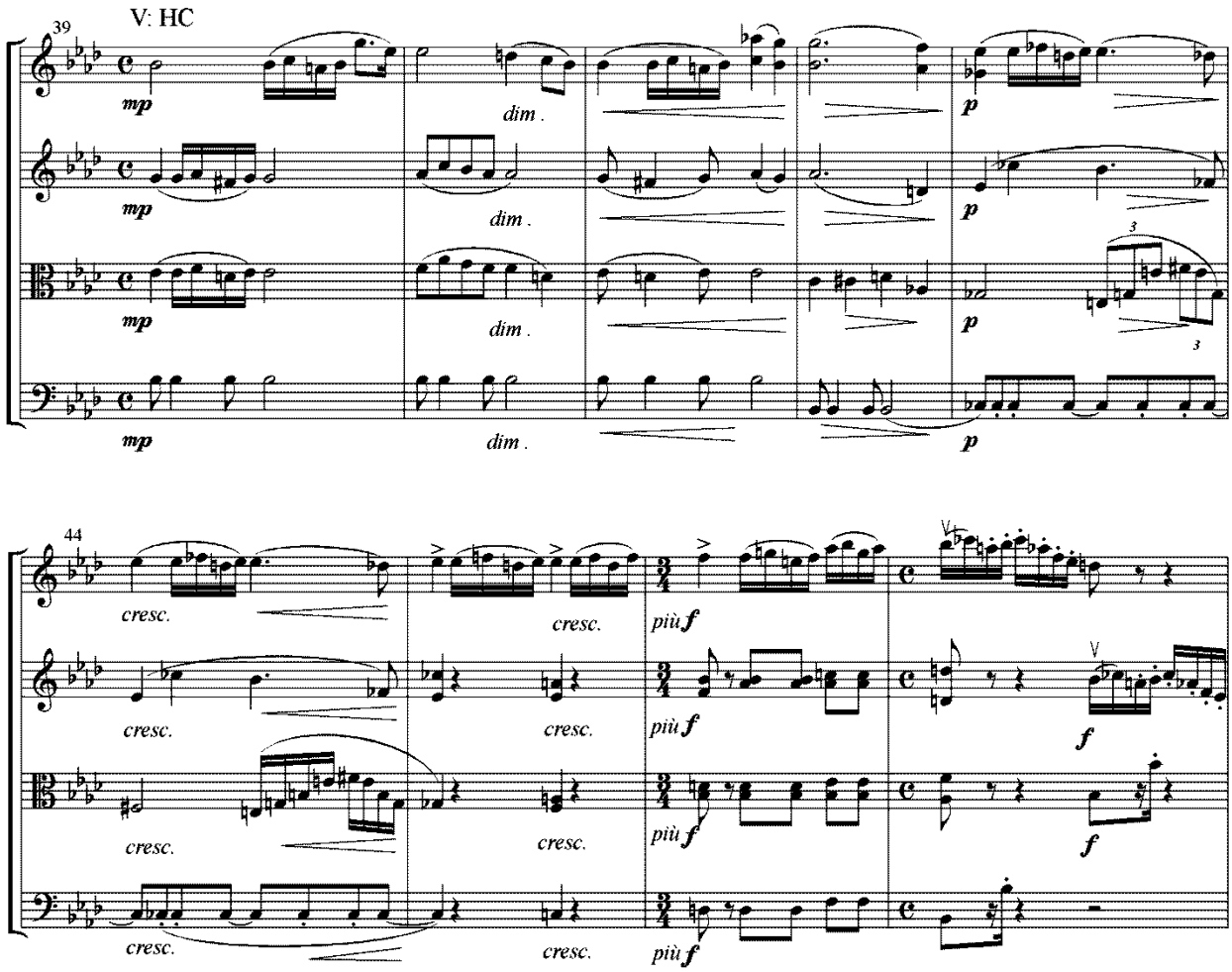
Further explorations along the spectrum of MC effects.

Usually, even the clearest of Dvořák's medial caesuras will incorporate one or more of the MC-obscuring techniques outlined above. For example, one of the clearest medial caesuras in Dvořák's output occurs in his last sonata-form work, the String Quartet in A♭ Major, op. 105

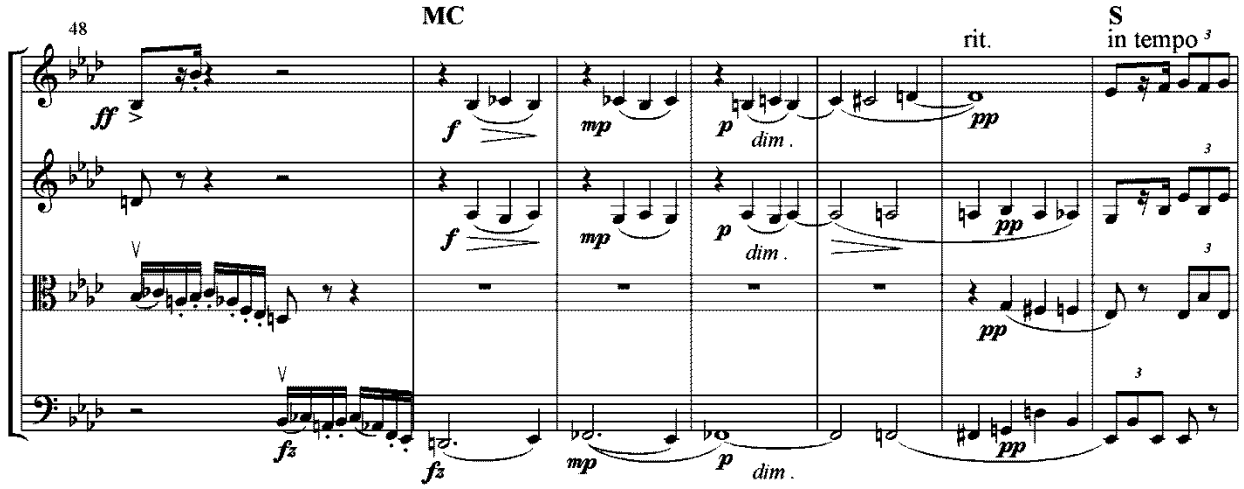
[22] Hepokoski and Darcy, 142.

(1895). TR begins at m. 32 and employs mixed meter to heighten the feeling of instability and increased energy typical of TR-rhetoric. Dominant-lock begins as early as m. 39 (with a six-four chord above B♭) and is followed by a V:HC MC at m. 49 (see Example 3–13). This MC is made problematic by the presence of D in the bass, suggesting a non-normative V^6 as the chord that articulates the MC. Four measures of highly chromatic CF follow (chromatically rising parallel sixths with rhythmic displacements), leading to a dominant-seventh chord in root position directly before S begins in E♭ major at m. 54.

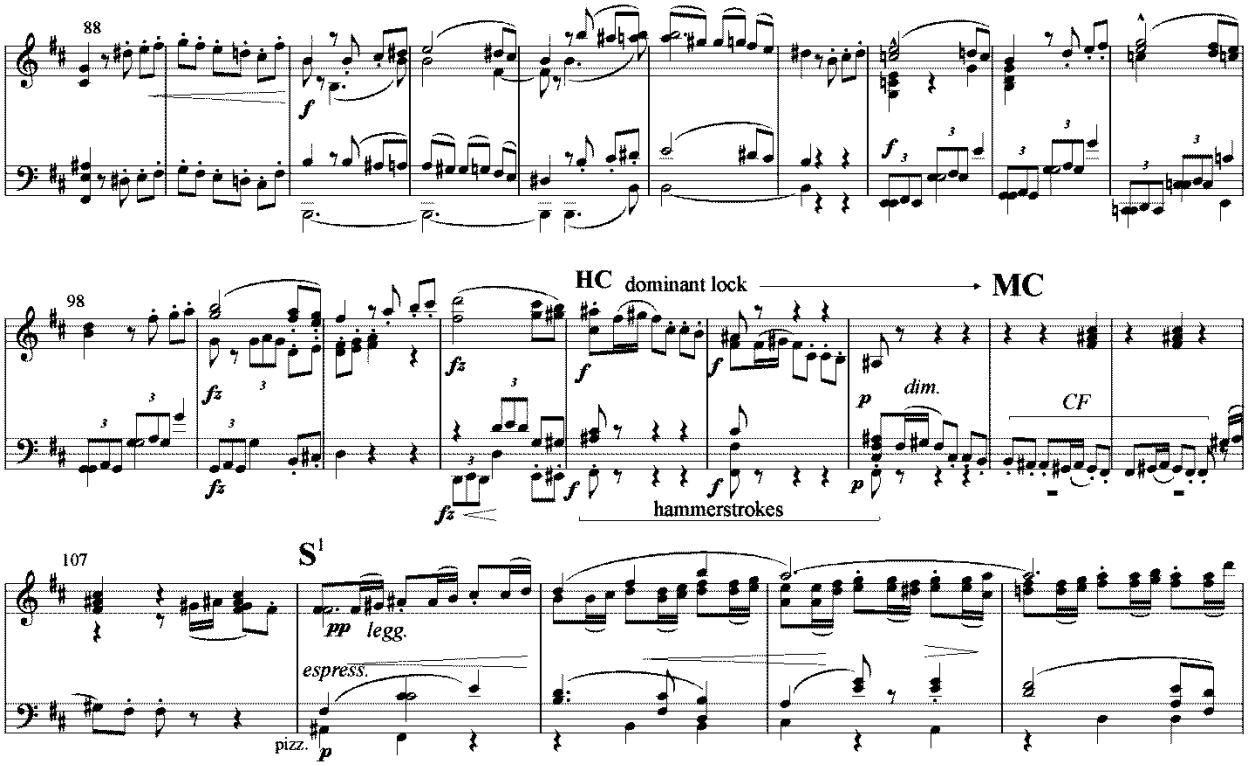
Example 3–13. String Quartet in A♭ Major, op. 105, i, mm. 39–54. MC occurs over V^6 but CF restores root-position V directly before S.



Example 3–13. continued. String Quartet in A♭ Major, op. 105, i, mm. 39–54.



Example 3–14. Score reduction of the Sixth Symphony, i, mm. 88–111. TR anticipates B major before generically normal MC.



Another example of slightly problematized MCs can be found in the Piano Quintet in A Major, op. 81 (1887), which, in spite of the grand pause after its MC at m. 92 (the most salient of the generic MC-markers), also includes an MC-feint that points toward a I:HC MC at mm. 84–86 before closing on an emphatic iii:HC MC.

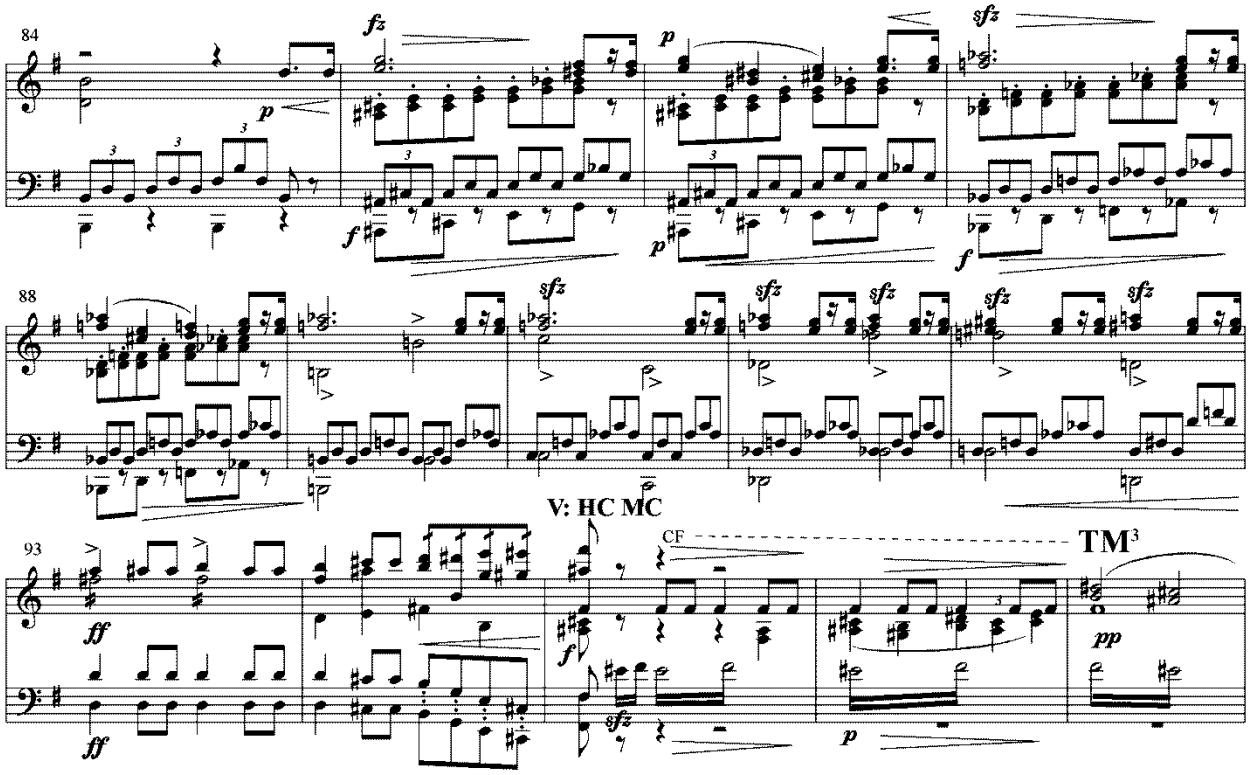
The last example of an obvious and mostly uncomplicated MC can be heard in the Sixth Symphony (see the piano reduction in Example 3–14), which is very clear despite Beveridge's claim that "…some doubt does arise as to the precise spot where the bridge gives way to the second group."[23] While it is true that B major is the key of the second group, the arrival on B at m.90 is neither the goal of the transition (it is harmonically unstable, part of a series of descending fifths) nor the onset of the S-zone. Indeed, transitional motivic material continues through m. 90 up to the texturally salient three hammerstrokes in mm. 102–104 that signal the arrival of the vi:HC MC at m. 105.[24] Contrary to Beveridge's claim that the true second group begins at m. 120, the commencement of the S-zone in B minor at m. 108 is not problematic (indeed, Clapham has no qualms about identifying the theme at m. 108 as the first part of the second group).[25] To further clarify, we can label m. 108 as S^1 and m. 120 as S^2.

As a last item of discussion for this section, we may wish to consider Dvořák's employment of the trimodular block (TMB). Recall that in its most orthodox formulation, a trimodular block has a double MC. The first MC usually comes surprisingly early in the exposition, often leading to a "flawed" attempt at S (called TM^1). Transitional rhetoric then returns (TM^2) and leads to a second MC. The following material (TM^3) is usually a better S-

[23] Beveridge, 275.
[24] Thus Beveridge is not quite correct when he says that "…B major arrives *decisively* at m. 90…" (my emphasis), a statement that is called into question by his observation that at the same time nothing of thematic significance happens. Beveridge, 275. To be considered decisive, arrivals of the key of S-zone area should be accompanied by a change of thematic material; otherwise, they are more likely construed as steps within the TR-process.
[25] Clapham, 73.

candidate and leads to the EEC.[26] It seems that the only first movement from late in Dvořák's career that unambiguously utilizes this strategy is the Eighth Symphony (1889), though the first movement of the String Quartet in G Major, op. 106 (1895), is certainly in dialog with a TMB-type construction.

Example 3–15. Symphony no. 8 in G Major, i, mm. 84–97. Second MC of TMB.



As far as the Eighth Symphony is concerned, the two MCs are relatively clear. We have already discussed the first iii:HC MC on pp. 179–80 (see Example 3–12). TM^1 begins at m. 77 with a sentential construction. Around m. 89, with the entrance of the horns and trombones, we begin to understand that the continuation phrase of TM^1 begun at m. 85 has dissolved into TM^2,

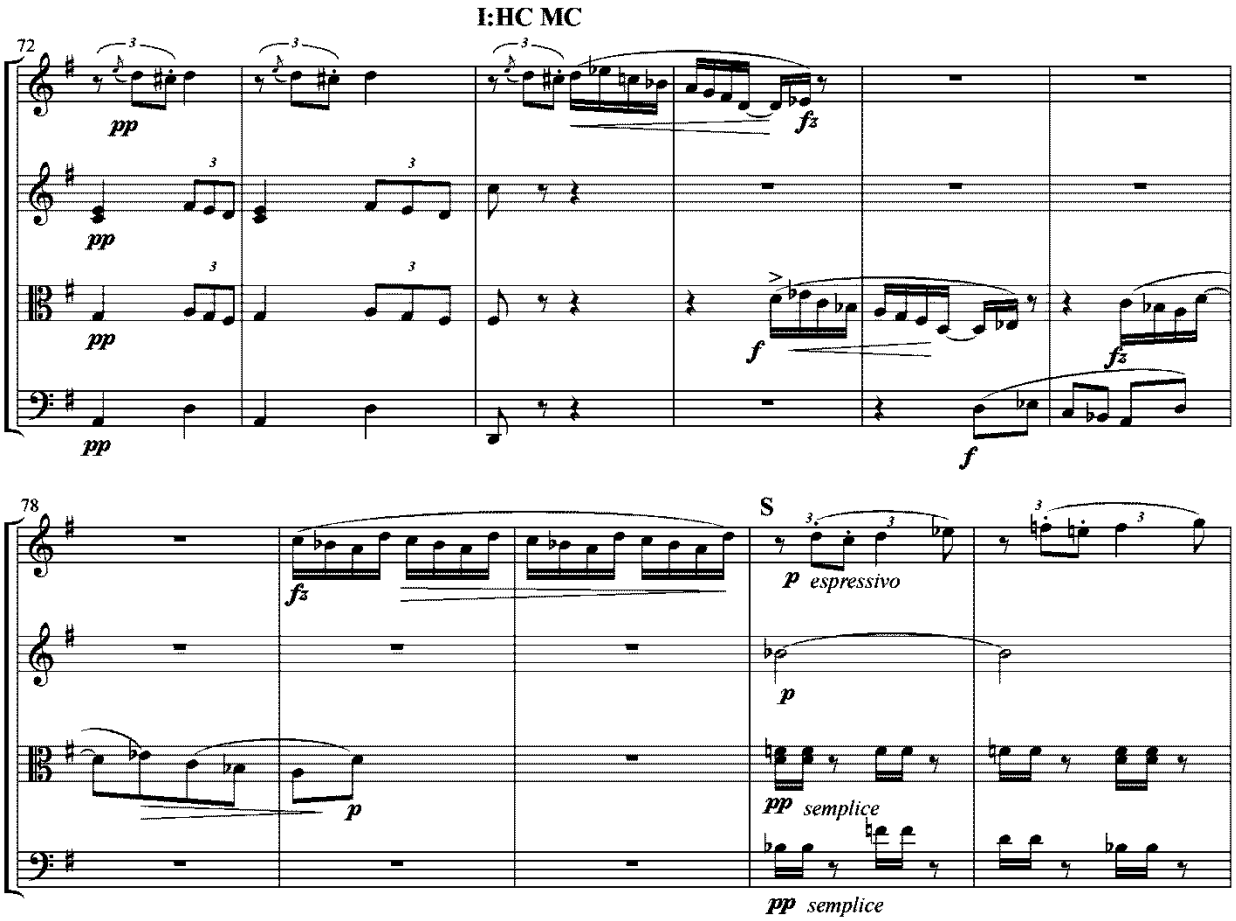
[26] The exponential numbers of the TM-modules do not indicate that PACs have occurred.

which becomes quite TR-like. A second, forceful iii:HC MC is heard at m. 95 (see Example 3–15). The CF of the following two measures exists as a modal corrective, leading us to TM^3 in B major, the key in which the exposition closes. The recapitulation in G minor/major is almost exactly analogous to the B minor/major of the exposition, with the tonic minor at TM^1 (m. 255) giving way to the tonic major for TM^3 (m. 275).

The massive first movement of the String Quartet in G Major, op. 106, is in dialog with the TMB-type of exposition. The G-major tonality of the sentential P^1 is jeopardized as early as m. 17, when V^4_2 resolves, not to I^6, but a substitute harmony, B^7, an instance of the ic 4–2 transform described by Richard Bass.[27] This initiates a dominant-lock on B (V of E minor). A vi:HC MC-effect in m. 22 is reinforced throughout the following measures by a $\hat{5}$–$\hat{1}$ CF-like gesture in the cello; a new theme begins in E minor at m. 26. A first-time listener might be forgiven for assuming that the new theme is a likely candidate for S (or perhaps, because of its relatively early appearance, a TM^1 module). A return to G major (prepared by its cadential six-four chord in m. 44) soon dispels such an understanding of the formal outline. Instead, we understand the new theme at m. 26 to have been P^2, the B section in a large-scale ternary construction of the movement's P-zone. The third section of the P-zone (which we could label A′) begins at m. 48. It is built on the motive of P^2 and soon dissolves into TR. The true MC of the movement finally arrives at m. 74 as a lower-level default I:HC MC (additionally complicated by the inclusion of the chordal seventh; see Example 3–16). The following CF does not modulate; it merely changes the mode from major to minor. When S begins in B♭ major (♭III) at m. 81, we understand that a common-tone modulation has taken place.

[27] Richard Bass, "Half-Diminished Functions and Transformations in Late Romantic Music," 41–60.

Example 3–16. String Quartet in G Major, op. 106, i, mm. 72–82. A I: HC MC this late in the exposition is a lower-level default.



Interestingly, when P^1 returns in the recapitulation at m. 263, it is joined by a new *cantabile* countermelody and a pulsating chordal accompaniment. This is not the only compositional change from the exposition. Indeed, the subsequent *Anlage* of the recapitulation is not at all analogous to the exposition; there is no ternary construction to the recapitulatory P-zone. The P^2 motive, which had played a major role in the development (including a salient statement in the tonic minor), is wholly absent from the recapitulation. Instead, P^1 itself dissolves into TR around m. 281. The recapitulatory MC is also not clear, despite the avoidance of the TMB-resemblances of the exposition. We are faced with the slippery choice between a

de-energizing transition and a I:HC MC medial caesura blurred by textural continuation at mm. 302–304, though the harmonic and rhythmic stasis on a pure D-major chord in these three measures supports the latter interpretation.

Hepokoski and Darcy have written that "if there is no MC, there is no S."[28] Following their concept of the blocked MC, though, we can accommodate the realities of Romantic music, whose practitioners often preferred continuous textures and smooth formal joins to the clear punctuations and symmetries of their Classical forebears. That is, working the formulation backwards, if there is an obvious candidate for S, there must have been a medial caesura (no matter how weakly articulated) or its substitute, the de-energizing transition. Since Dvořák, along with many other Romantic composers, preferred a strong thematic contrast between the two main parts of a sonata-form exposition, there will be, more often than not, an obvious candidate for S. Hence, we must be flexible in our identification of the MC in these works: it is often not so much a *point* as an *area* of articulation. These areas of articulation can be explained, in part, by the categories of MC-complication or replacement that I have proposed here.

[28] Hepokoski and Darcy, 117.

II. Issues of Essential Exposition Closure (EEC) and Essential Sonata Closure (ESC) in Dvořák's Sonata Forms.

In its most general sense, the essential exposition closure (EEC) of Hepokoski and Darcy's Sonata Theory is the point at which one hears the first satisfactory perfect authentic cadence after the onset of the S-zone; the EEC must be followed by differing musical material.[29] In Schenkerian terms, the PAC of the EEC is also the termination of a linear progression (*Zug*), normally a fifth-progression, $\hat{5}$–$\hat{1}$, in the subordinate key. Hepokoski and Darcy are careful to note that two or more fifth-progressions at the foreground are very often telescoped into a single progression in a graph of the deep middleground, thus inviting the analyst to make a careful study of all PACs in the S-zone in locating the *Zug*-PAC (ZPAC) and/or EEC. Given that the EEC is the first satisfactory PAC and that more (sometimes much more) material may follow, they state that "its 'closure' may not in fact be absolute or 'fully satisfying' from the perspective of the larger proportions or other telling factors within the exposition as a whole. This first PAC closing the essential exposition is primarily an attainment of an important generic requirement—nothing more and nothing less."[30] Using the analogy of an airplane landing, they say that the EEC is the point of touchdown and further travel along the landing strip is within the domain of the closing module. The recapitulative analog of the EEC is the point of essential sonata closure (ESC), when the S-zone achieves its cadence in the home tonic.

In the following section, we will examine Dvořák's strategies concerning exposition and sonata closure, including those in which no closure occurs ("failed expositions" or "failed sonatas"). As was the case with his use of the medial caesura, Dvořák's practices will very often

[29] See Hepokoski and Darcy, esp. chapter 8.
[30] Ibid., 124.

be less clear than those of his Classical antecedents. As there was a spectrum of MC-effects (portrayed in Example 3–2), there is also a spectrum of EEC-effects, from very clear on the one hand, to completely absent on the other (see Example 3–17). Although the ESC often is a large-scale rhyme of the EEC, there are cases in which an unproblematic EEC is answered by a problematized, nonresolving recapitulation—that is, it has some sort of ESC-substitute or even no ESC at all.[31] In spite of this, the EEC-spectrum is a fairly reliable proxy for the ESC spectrum.

In terms of generic requirements, an exposition is either successful in attaining a PAC at the end of the S-zone or it is not. There is no middle ground. An exposition with a masked or attenuated EEC is still considered successful because there is an identifiable point or area of closure. There are two types of failed expositions, the first of which has neither EEC nor EEC-substitute. The second type articulates an EEC-substitute (a PAC in the wrong key), which is the closest we get to a gray area between success and failure.[32] We should note that "wrong key" implies a key that is not one of the defaults of Sonata Theory. For example, in minor-mode works both III and v are considered normative. Also, since Schubert's three-key expositions almost invariably close in the dominant, we should not see these instances as failed expositions even though S closes in a different key than that in which it began.

As an analog to failed expositions, a sonata with a nonresolving recapitulation can be said to be a "failed sonata." Narrative implications aside, the role that the coda plays in these pieces attains structural importance. We will examine some coda issues, fittingly, at the end of this chapter.

---

[31] See Hepokoski, "Back and Forth from 'Egmont': Beethoven, Mozart, and the Nonresolving Recapitulation," *19th-Century Music* 25, no. 2/3, The Long Century, 1780–1920 (Autumn 2001–Spring 2002), 127–54; also, Hepokoski and Darcy, *Elements of Sonata Theory*, esp. 245–54.

[32] For a more thorough exploration of failed expositions in the Classical era, see Hepokoski and Darcy, *Elements of Sonata Theory*, 177–79.

Many of Dvořák's EECs and ESCs are actually clear and unproblematic, as can be seen above on the chart in Example 3–1. For those falling closer to the problematized end of the EEC (or ESC) spectrum, there are several main subgroups. They are as follows:

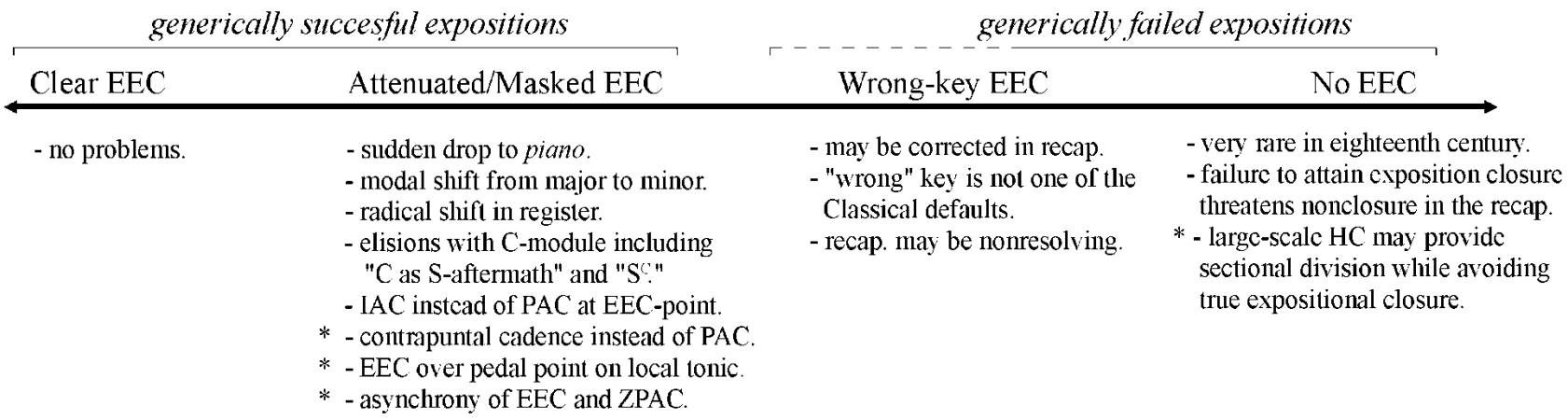
1) **Masked or attenuated EECs (and/or ESCs)**. These are generically successful expositions (and/or sonatas) that achieve a point of EEC (and/or ESC) although this point is somehow problematic. The EEC might suffer from one or more of the following weaknesses: sudden textural shifts (of dynamics, register, or mode) at the cadential moment; elisions with C-modules; or the replacement of the PAC with an IAC.

2) **Wrong-key EEC substitutes**. A "wrong key" is Classically non-normative. This type of "failed exposition" may be corrected, or not, in the recapitulation (for the latter, see the fourth subgroup in this list).

3) **Expositions that lack an EEC**. Extremely rare in the eighteenth century, this type of "failed exposition" is still uncommon in the nineteenth century. There are important repercussions for the recapitulation when composers use this type of exposition. Large-scale half cadences may provide sectional division without providing a true sense of exposition closure.

4) **Nonresolving recapitulations.** Unlike the "failed exposition," some types of which may be corrected (rescued) in the recapitulation, the nonresolving recapitulation indicates a "failed sonata." The coda, traditionally outside of sonata-space proper, takes on structural importance as the carrier of tonal resolution. Nonresolving recapitulations may sometimes happen even when the exposition was tonally normal.

Example 3–17. A spectrum of EEC effects, especially with respect to later nineteenth-century music. Most of these EEC characteristics are discussed by Hepokoski and Darcy (esp. 150–79). The bullet points with asterisks indicate additional procedures not found in Sonata Theory.



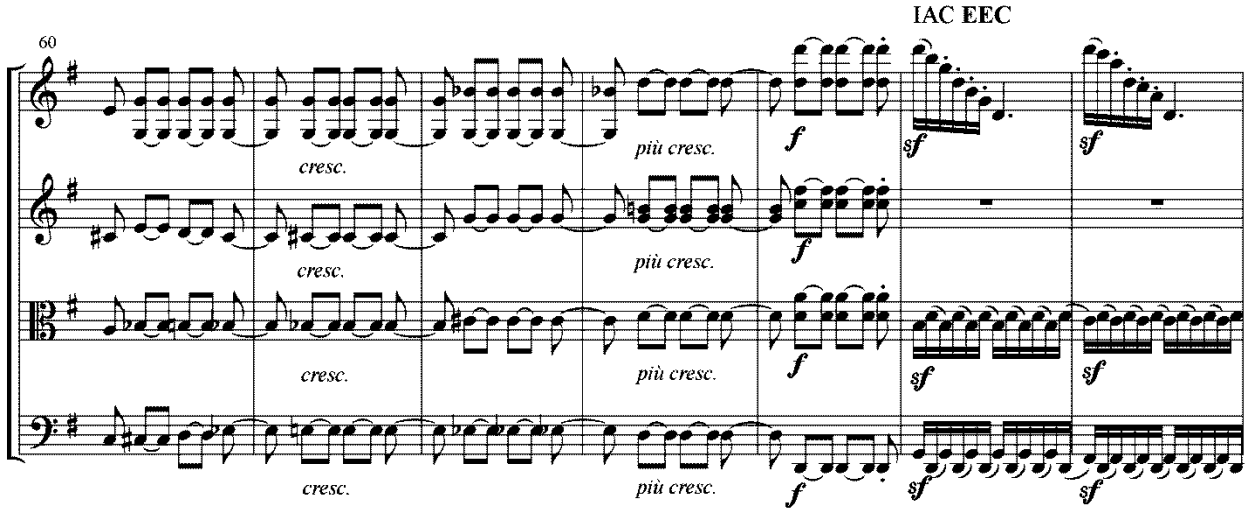
Masked or Attenuated EECs.

This is by far the largest category of EEC-effects. As a rule, an S-zone will cadence in the key in which it began, although the manner in which the cadence is achieved might be problematic in some way. Among the features listed by Hepokoski and Darcy for problematizing the EEC are a sudden drop to a *piano* dynamic, a modal shift (as in a minor-mode EEC terminating a major-mode S), a radical shift in register, and an elision with the C-module. To their list I would add three further devices: 1) a contrapuntal cadence, where an inversion of the dominant triad or the dominant-seventh chord—usually V^6, V^6_5, or V^4_3—is made to stand in for a root-position dominant, 2) the EEC occurring over a local pedal point, and 3) the asynchrony of the EEC with the Schenkerian linear descent (ZPAC).[33]

Many of these effects are found in Dvořák's music and in the music of his nineteenth-century contemporaries, but the roots of such formal blurring can be traced back to Classical-era pieces, where they were considered deformations of more normal generic defaults. The first movement of Beethoven's String Quartet in E Minor, op. 59, no. 2, for example, has a problematized EEC. Expositional closure at the end of the S-zone is continually thwarted by the refusal of the music to resolve to the local tonic triad of G major. This is especially audible at mm. 48–49 and 52–53 when the dominant-seventh chord moves to $F\sharp^{o4}_2$, the bass tones D–E♭ perhaps representing a kind of deceptive resolution. The best candidate for the EEC is this movement occurs at m. 65 (shown in Example 3–18), and is best understood as an IAC EEC that elides with beginning of the energetic C-module.

[33] Hepokoski and Darcy only lightly touch on this issue, 147–49.

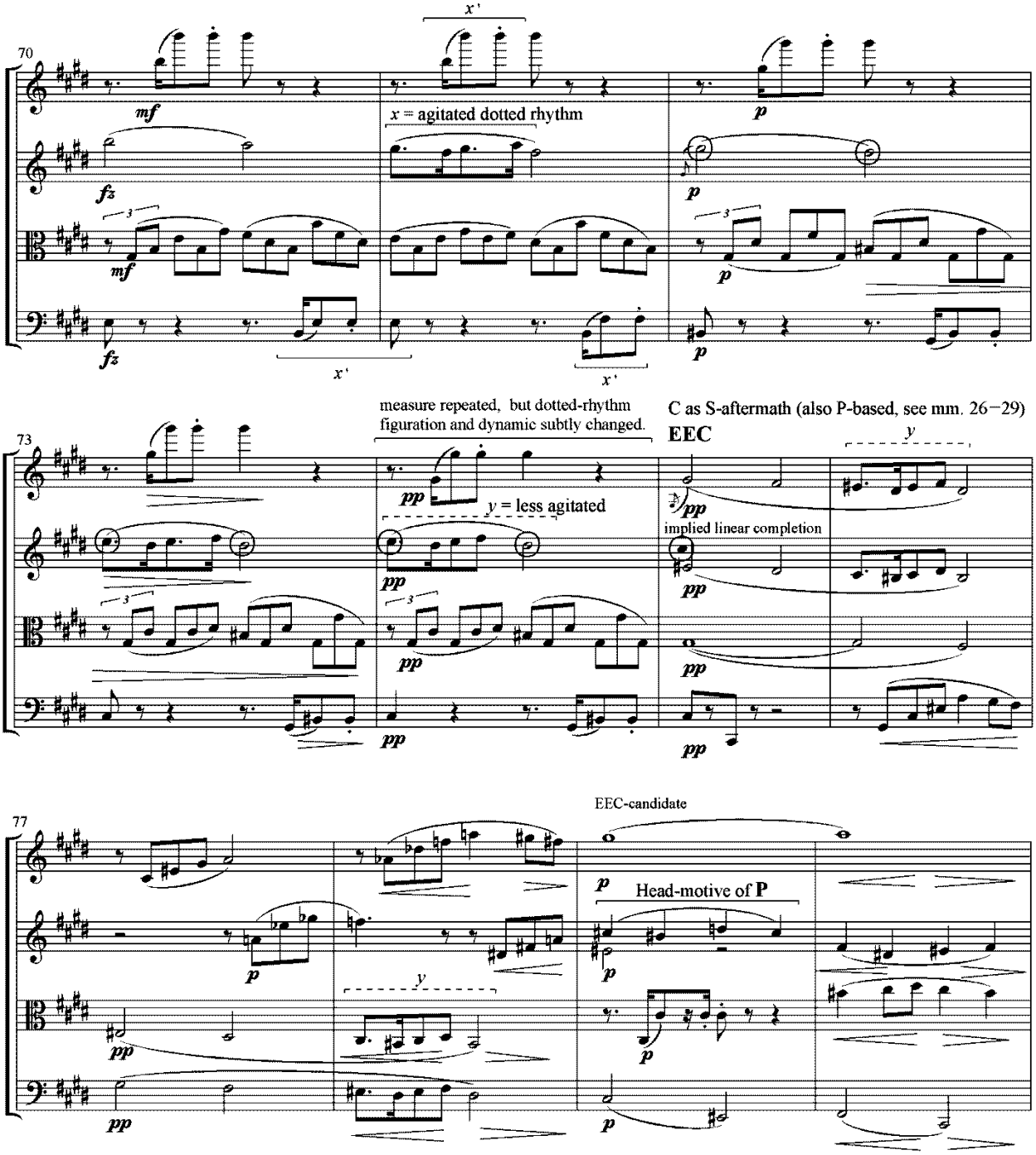
Example 3–18. Beethoven, String Quartet in E Minor, op. 59, no. 2, i, mm. 60–66. Generically irregular IAC EEC since $\hat{5}$ is in the top voice.



String Quartet in E Major, op. 80 (originally op. 27).

The EEC of Dvořák's String Quartet in E Major is masked, but there are two plausible EEC-candidates: mm. 75 and 79 (see Example 3–19). The first is a Picardy-third contrapuntal cadence in C♯ minor, the latter a contrapuntal cadence in C♯ major. I hear m. 75 as the stronger candidate. There are several features that tip the analytical scales in favor of m. 75. Among these are the clear shifts in texture and mode that occur here. Whereas the S-theme had begun in C♯ minor with an agitated dotted-rhythm accompaniment, it gives way at this point to a more placid version of itself in C♯ major in which the dotted rhythms are subtly effaced in the melody and eliminated in the accompaniment. The solid brackets of Example 3–19 indicate that the rhythmic figure, marked *x*, is a twofold statement of a dotted-eighth-sixteenth figure (*x′* is the accompanimental version).

Example 3–19. String Quartet in E Major, i, mm. 70–80. Melodic descent to implied $\hat{1}$ marked in circled notes. C is S-like.



The elision between cadential and initiatory functions at m. 75 is subtly prepared in m. 74 by the figure *y* (shown by the dashed bracket), in which the second dotted-eighth-sixteenth figure is simplified to two equal eighths; after m. 75, the accompanimental *x′* is absent. The arrival at C♯ major at m. 75 produces a Picardy-third effect, an effect that is common as a sign of some sort of musical achievement, often as the happy solution to a modal or expressive problem.[34] Also here is the implied melodic achievement of C♯, the local tonic goal of the linear descent; it is implied because of the elision with the beginning of the C-module, whose top voice begins again on $\hat{5}\ \hat{5}$ (see the circled notes in the second violin in Example 3–19). This elision is a parallelism to the one we heard earlier when the CF gave way to S at mm. 48–50 (see Example 3–3b) and includes a similar cessation of leaping-octave figuration in the first violin.

Two points speak against m. 75 as the EEC, however. One has to do with the grouping structure beginning as early as m. 50, where S begins. This structure consists of non-overlapping two-measure units. A one-measure repetition at m. 74 extends the two-measure group to three measures; m. 75, which is highlighted by this extension, begins a new group. This would seemingly disqualify m. 75 as an arrival point within a phrase (and, by extension, as the EEC), since m. 75 does not belong to the preceding group and therefore cannot terminate it (whereas no such grouping boundary exists at m. 79).[35] A formal labeling that follows grouping structure

[34] A Picardy-third effect at sectional divisions is quite common, even in non-cadential situations. For instance, the S-zone of a major-mode work might begin in the key of the major dominant despite the termination of TR with a v:HC MC, as in the first movements of Mozart's Piano Sonata in F Major, K. 332, and Beethoven's Symphony no. 2 in D Major, op. 36 (cf. Hepokoski and Darcy, 25). A similar Picardy-third effect, though at a different structural join, can be heard in the first movement of Beethoven's Sonata in C Major, op. 53, "Waldstein," at the beginning of TR (which starts as a parallel consequent phrase), following the modal decay to the half cadence that terminates the grand antecedent. Dvořák's own Ninth Symphony is another example of the Picardy-third effect at a structural join: the G major of the C-zone "resolves" the G minor of the S-zone.

[35] Cadences must be contained within the group (or phrase) according to the theories of both Lerdahl and Jackendoff and Caplin.

alone would miss the implied linear completion of the melody at m. 75, treating that measure entirely as beginning and not at all as ending or culmination.

The second point that seems to speak against m. 75 is that according to Sonata Theory the EEC should be followed by new material. What I have marked as the closing theme in Example 3–19 sounds very much like a continuation of the thematic material of S; this would indicate a situation in which the EEC-candidate was being "overwritten" or denied by a return to the melody of S. The melody at m. 75 is not *only* a continuation of S, however, but an almost verbatim return to mm. 26–29, the transitional portion of P (which, incidentally, also contains the less agitated version of the dotted-rhythm motive). Thus, in Dvořák's hands, C is multivalent: it is both P-based and retrospectively S-like. Dvořák makes this P-based connection even more explicit when the head motive of m. 1 returns in m. 79. Admittedly, the return of the head motive is an argument in favor of m. 79 rather than m. 75 as the EEC. Hepokoski and Darcy use the term "C as S-aftermath" to describe this backward glance at the material of S within the closing zone. They offer for examples Beethoven's Piano Trio in E♭, op. 1 no. 1, and Schubert's Symphony no. 8 in B Minor, "Unfinished." Because the EEC-effect is attenuated in the op. 80 quartet, listeners' interpretations of the various musical parameters (grouping structure, texture, harmonic rhythm, linear considerations, etc.) will affect their identification of the actual EEC-moment.

Surprisingly, while the S-zone closes in the key in which it began (the exposition is generically successful), the S-zone of the recapitulation is radically recomposed although it, too, is ultimately generically successful. First, there is no P-based counterstatement to begin TR. Rather, P blends into an S-based "secondary development" around m. 163.[36] A I:HC MC at m.

[36] The term "secondary development" is Rosen's, but is also treated at length in Beveridge, esp. 92–98.

194 leads to the normative transposition of S to the tonic. Second, in place of the P-based C of the exposition, Dvořák offers us a second MC-effect (I:HC MC) at m. 212 followed by a second statement of S. This second phrase of the S-zone, $S^{1.2}$, returns to C♯ minor, the same key as the expositional S; it is as if the sonata could not fully release its fixation on this key.[37] Indeed, this second S cannot seem to achieve a cadence before P-based material returns in m. 227. A return to the opening material of P starts the coda at m. 234, which also marks the final descent of the *Urlinie*, the recapitulatory ZPAC. Thus, $S^{1.2}$ is parenthetical; there would be no structural difference if a cut were made from m. 213 to m. 234. That is, the whole C♯-section could be taken as an extensive example of ESC deferral (though not denial), the interpolated statement of $S^{1.2}$ acting as a deceptive cadence writ large

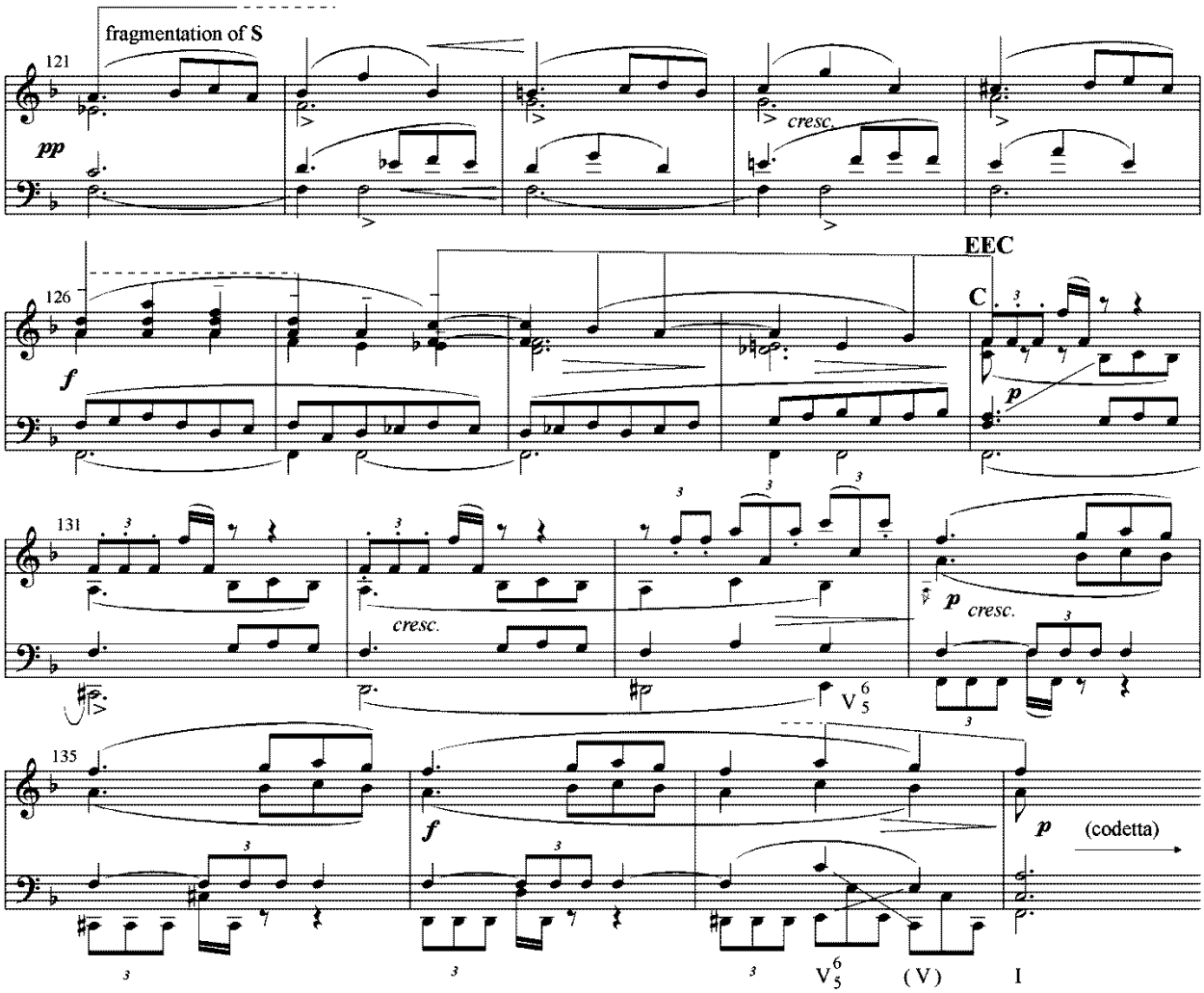
String Quartet in D Minor, op. 34.

The S-zone of the String Quartet in D Minor begins and ends in F major (III), but the route it takes from the beginning to end of the section is anything but straightforward. It is 82 measures long (approximately 58% of the exposition) and detours as far afield as B major (the key in which the development will begin). We hear melodic descents in mm. 126–29 and 137–38, but both are problematic EEC-candidates because they lack the cadential support of a root-position dominant (the two descents are lightly beamed in Example 3–20). The first descent is undercut by the pedal point on the local tonic, and the second is supported only by a weakly articulated contrapuntal cadence. More tellingly, the first EEC-candidate completes a thematic

[37] In addition to its importance for this movement, C♯ minor is the key of the Trio of the third movement, and an important harmonic goal in the finale.

process (in William Caplin's sense) that began with a fragmentation of S at m. 121, whereas the second EEC-candidate occurs at the end of a repeated four-measure cadential module whose function is clearly postcadential in a larger sense. Thus, the EEC of the op. 34 quartet exists without root-position cadential support; it is almost entirely a melodic phenomenon.

Example 3–20. Piano reduction of the String Quartet in D Minor, op. 34, i, mm. 121–38. Clear melodic descent to the EEC occurs over a tonic pedal.



Identifying the ESC in the recapitulation proves even more elusive. From a rotational or rhetorical perspective, the coda should begin at m. 318. It is analogous to m. 130, the measure in

which the EEC occurred, and the rhythmic figuration of the expositional C-motive is also initiated. A salient recapitulatory difference occurs at m. 318, however (marked by the asterisk in Example 3–21a): Dvořák substitutes a D-dominant ninth for a pure tonic, thwarting melodic closure; the *Urlinie* remains incomplete.

When, in m. 320, the first violin does descend to D, we understand it as an inner-voice passing tone harmonized by a pre-dominant $E^{ø7}$ chord (see the reduction in Example 3–21b); the first violin is covered at this point by the second violin (marked by a dotted bracket in Example 3–21a). The first tonic chord that can claim for itself the mantle of the ESC finally arrives in m. 322, now minor and contrapuntally prepared (if the intermittent tonic pedal is disregarded) by the V^4_3.[38] Our identification of m. 322 as the ESC, and thus the beginning of the coda is confirmed when at m. 326 (not shown) we hear the return of P-material, a typical generic marker of codas.

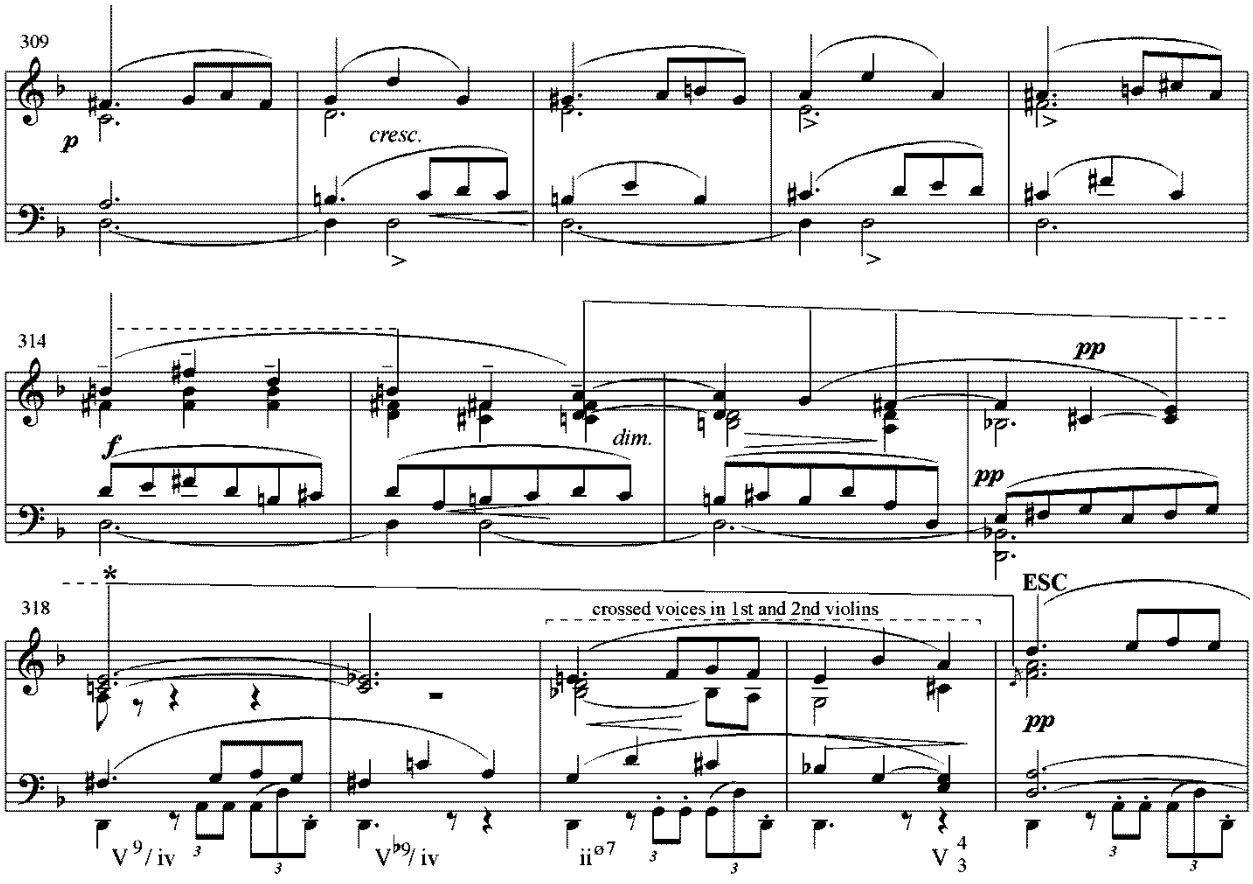
In this quartet, both the EEC and the ESC are irregular according to Sonata Theory norms: there is no PAC in either location; a root-position dominant is lacking. Yet melodic descents and other voice-leading factors (such as the contrapuntal resolution V^4_3–I) still allow us to identify the best candidates for points of closure. Dvořák's clever play with generic markers and listener expectations in this quartet is masterful. The major-mode EEC sets up the expectation of an analogous major-mode ESC. The major-mode ESC is thwarted, however, by

[38] Heinrich Koch's distinction between a *Grundabsatz* (a phrase that ends on some member of the tonic triad) and a *Schlußsatz* (cadential phrase) is useful here. The cadential phrase must end with a *Kadenz*, defined by Koch as a three-tone succession: the preparation of the cadential tone, the cadential tone itself (usually the second degree of the scale), and the keynote. See Koch, *Versuch einer Anleitung zur Composition*, translated by Nancy K. Baker as *Introductory Essay on Composition* (New Haven: Yale University Press, 1983), 38; also 149–50, where Koch discusses extensions of the phrase: "it should be noted that, in case such an appendix or several of them are made, the decoration of the caesura or its overhang should not reach the octave of the root of the underlying triad until the phrase has attained its maximum completeness." When the octave is reached, this is a signal of the end of the *Hauptperiode* (Koch's terminological equivalent of the EEC or ESC); the phrase should be extended no further by additional appendices. The implication for analysis is that "in the comparison of the punctuation of phrases, only that phrase-ending with which the phrase attains its maximum completeness is taken into consideration. The preceding phrase-endings on exactly the same triad are not taken into account, but are considered as mere incises."

the suspension of the descent of the *Urlinie* at m. 318. Despite the presence of C-rhetoric at this point, sonata closure is not attained until four measures later, an extension that allows Dvořák to cancel the prevailing D major, ending the sonata proper with a minor-mode ESC at m. 322. By manipulating the moment of sonata closure so that it ends in the minor mode, especially when major-mode closure seemed so imminent, Dvořák seems to be implying a tragic narrative in which the major mode of S was not capable of securing sonata closure, being stifled or silenced in some way (Hepokoski and Darcy's "lights out" effect).

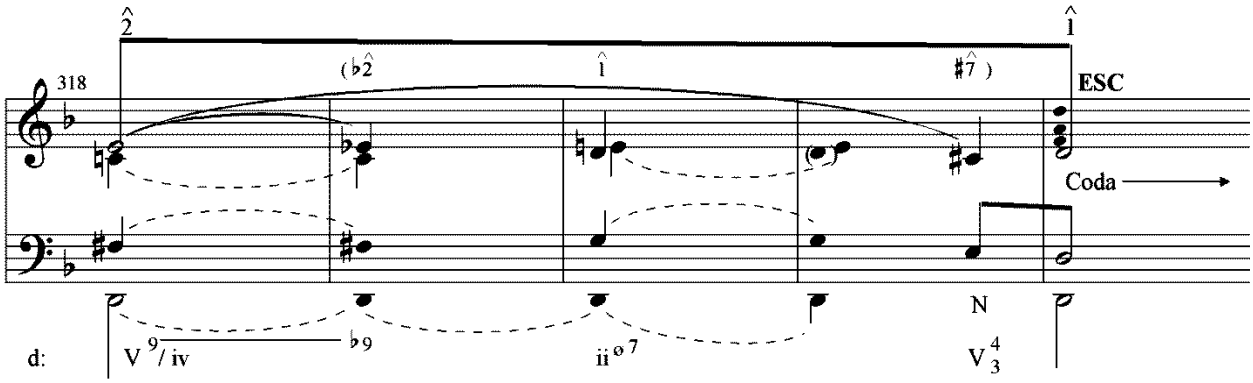
Example 3–21.

a. Piano reduction of the String Quartet in D Minor, op. 34, i, mm. 309–22. Melodic descent to the ESC is delayed as D major decays to D minor.



Example 3–21. continued.

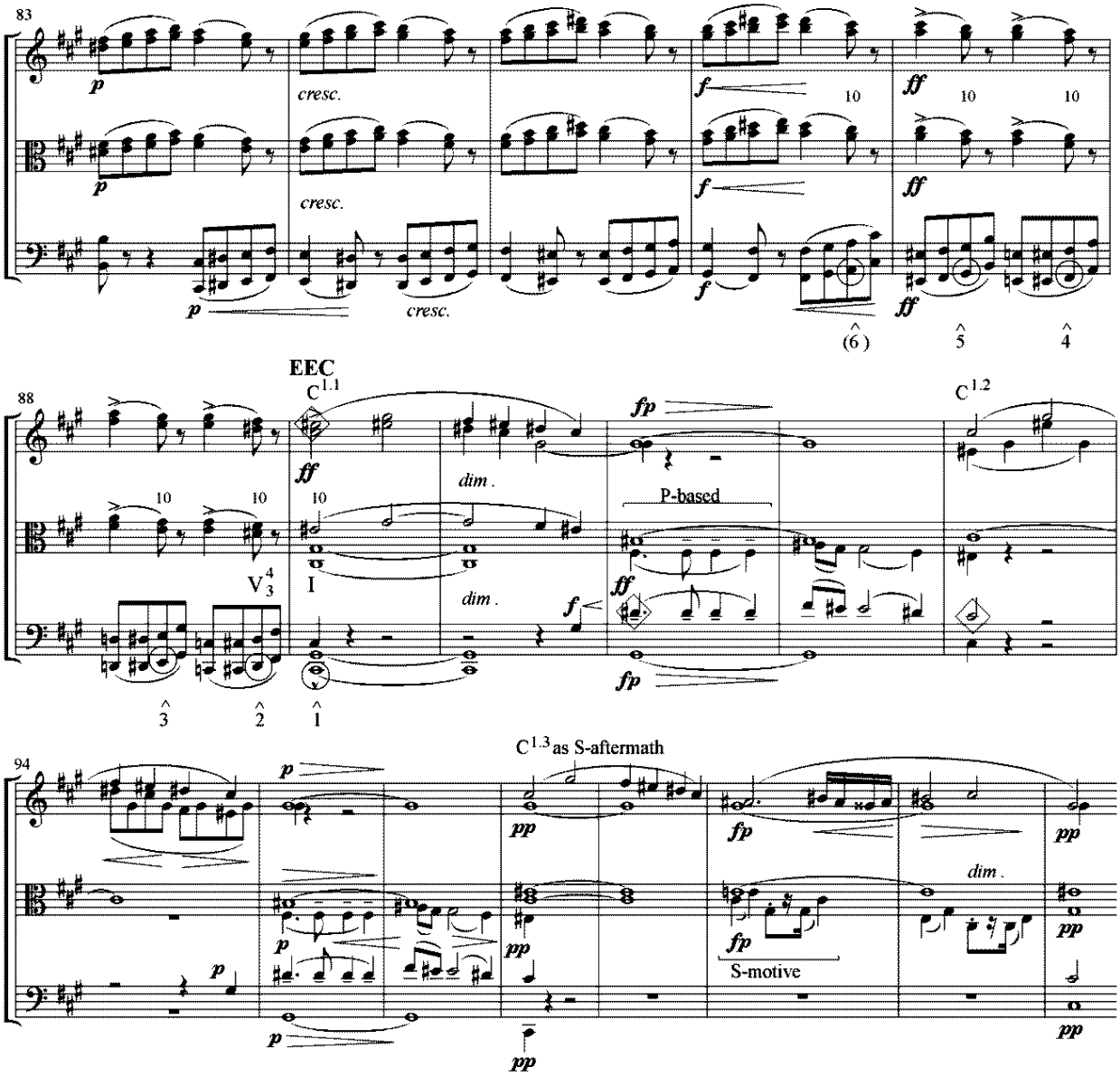
b. Textural reduction of mm. 318–22.



String Sextet in A Major, op. 48.

The EEC of the String Sextet is an interesting case. It is not immediately clear where it occurs as there is a conflict between design and structure. The *fortissimo* arrival of the C♯ major tonic at m. 89 (a Picardy-third effect) follows V^4_3 (see Example 3–22). This contrapuntal resolution at m. 89 is not a PAC, as required by the definition of the EEC. We have already seen, however, that sometimes the only possible candidates for the EEC or ESC in Dvořák's music are those that are approached contrapuntally. This passage is more complex that it initially seems; I discuss this passage in greater detail with regard to harmonic function and the linear descent of the bass leading into m. 89 in chapter 5, pp. 277–80. Even if there had been a root position dominant in m. 88, the top voice of m. 89 remains $\hat{3}$ and the cadence would still have to be classified as a generically irregular IAC EEC.

Example 3–22. String Sextet in A Major, op. 48, i, mm. 83–101. The EEC is marked by a melodic descent in the bass while the top voice only descends in the C-zone.



The material after m. 89 possesses several features typical of closing zones. Most importantly, there is the introduction of a new theme whose latter measures recall the main motive of the P-zone (a typical generic marker of the C-zone); there are also the repetitive, tonic-affirming V–I motions that we would expect in a C-zone (in Caplin's terminology, these would

qualify as tonic prolongations rather than as cadences). It is over these tonic prolongations within the C-zone that the descent to the local tonic, C♯, occurs (see the notes enclosed by diamonds in Example 3–22). The D♯4 of the first cello in mm. 91–92 resolves to C♯4 in m. 93 (and is heard again almost verbatim in mm. 95–97).

The asynchrony between the completion of the local melodic descent at m. 93 (clearly supported by root-position chords) and the contrapuntally approached EEC-moment at m. 89 (articulated by the linear descent of the bass) should not be seen as a symptom of faulty construction, but rather as typical of the affinity for blurred formal boundaries in the late-nineteenth-century musical aesthetic. Another instance of sectional blurring occurs shortly after m. 97 when we hear a return to the main motive of S. Rather than calling this a re-opening of S-space, we can identify it as an instance of what Hepokoski and Darcy refer to as "C as S-aftermath," a rare occurrence in the music of the eighteenth century, but one which becomes more common throughout the nineteenth century.[39]

Like the situation with the medial caesura in Dvořák's music, where it is sometimes difficult to identify the precise moment of articulation (but in retrospect we know that one has occurred), the EEC can be attenuated or masked. We can refine our understanding of nineteenth-century expositional closure by expanding the criteria by which we judge the moment where closure occurs. By admitting that the EEC does not always have to occur over a PAC, we allow that the EEC-moment may happen over a pedal point, at a contrapuntal cadence, or at an IAC.[40] By admitting that S-material can persist past the EEC-point (C as S-aftermath), or that linear

[39] Hepokoski and Darcy, 182. The authors identify the first movement of Schubert's String Quintet in C, D. 956 as exemplary of this strategy. Refer also to the discussion above (pp. 193–97) of the EEC in Dvořák's String Quartet in E Major, op. 80.

[40] For another instance where the EEC occurs at an IAC, see the discussion of the String Quartet in C Major, op. 61, on pp. 226–29 below.

completion can take place within the C-zone, we gain additional analytical flexibility. The blurring of sectional boundaries is symptomatic not just of Dvořák's music but of nineteenth-century music in general. Continuous textures, cadential elision (or avoidance), and the ethos of "endless melody" were valorized as helping to create a unified artistic statement.

Wrong-key EEC-substitutes.

EEC-substitutes in the "wrong" key indicate a "failed exposition" in the nomenclature of Hepokoski and Darcy's Sonata Theory, but, unlike expositions without an EEC, the wrong-key cadence of the EEC-substitute does provide an element of closure from a psychological perspective (especially for those listeners without absolute pitch), as it triggers expectations of expositional repeat or the commencement of developmental space. Wrong keys include all non-normative key areas for S. One must remember that mediant keys, especially after Beethoven and Schubert, become strong second-level defaults and, as such, must not generally be considered wrong keys.[41] S-zones that begin and end in different keys, however, may be considered eligible for wrong-key status if the terminal key is not a second-level default. For example, a piece that modulates to the dominant for the commencement of S but ends in a mediant key would qualify as a wrong-key EEC-substitute, as would an S-zone that began in a mediant key and cadenced away from that key (excepting the dominant). S-zones that begin with tonally unstable material, such as that in Dvořák's Sextet for Strings, might be said to

[41] These keys include vi, VI, ♭VI, iii, III, and ♭III in the major mode, and VI, vi, and iii in the minor mode (III being a first-level default in minor). Because ♯III/iii and ♯VI/vi are rare in minor, even in the Romantic era, we might consider them eligible for wrong-key status.

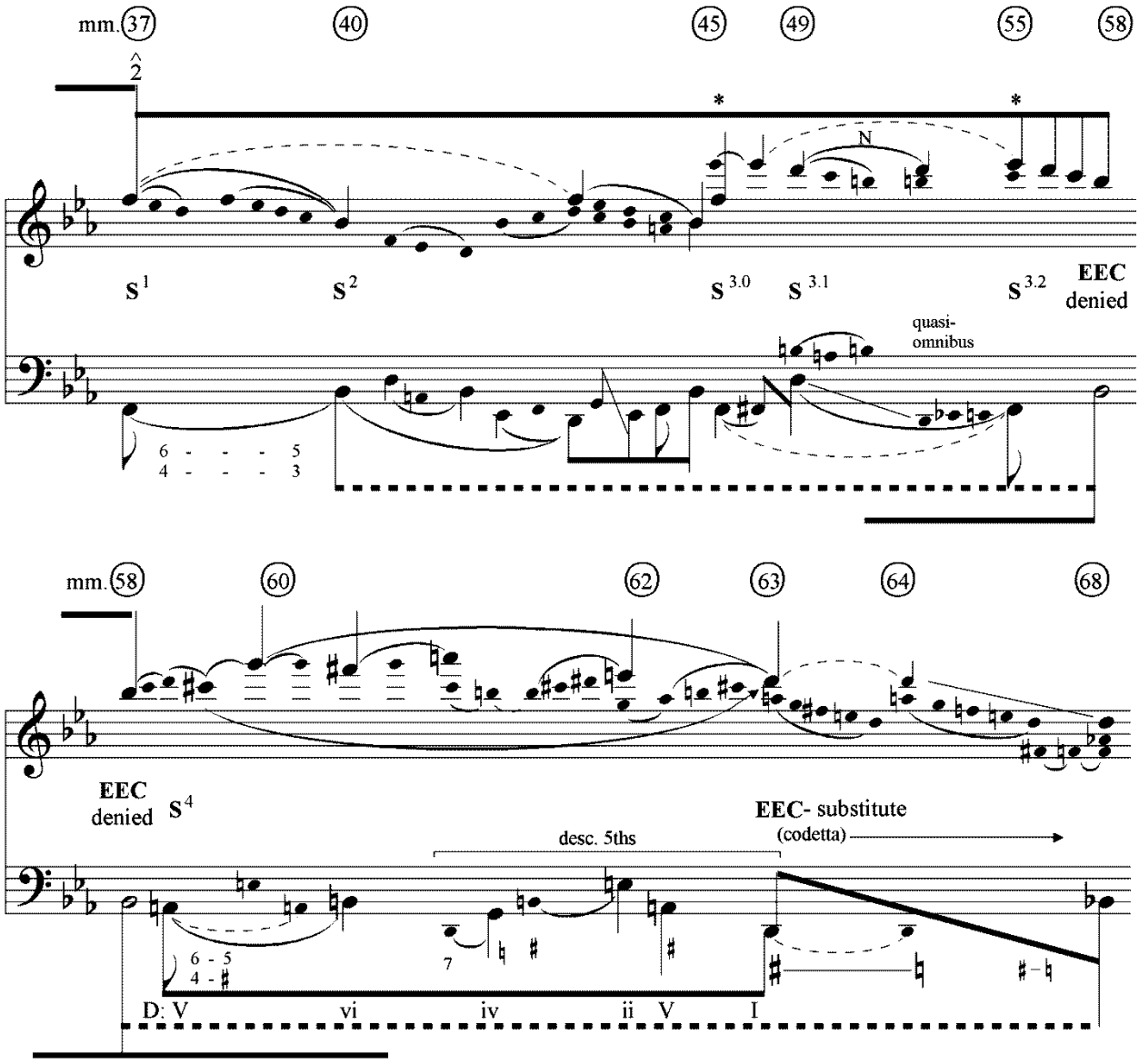
culminate in the EEC and should also not be considered for wrong-key status if the EEC occurs in any of the normative keys.[42]

String Quartet in E♭ Major, op. 51.

Of Dvořák's mature works, the String Quartet in E♭ Major is perhaps the best example of an exposition ending with a "wrong-key" EEC-substitute (see Example 3–23). Here, multiple descents to B♭ cannot be interpreted as strong EEC-candidates because they do not lead to new melodic material. Even the clear linear descent terminating at m. 58 is unable to secure expositional closure (marked "EEC denied" in the example); not only does similar melodic material continue past the cadence, but there is a retardation in the bass, preventing it from confirming the movement to B♭ until the metrically weak fourth beat of the measure. The next linear descent, complete with harmonic motion that includes a predominant, takes place over the next four measures but leads to a PAC in D major. Although the melodic material does continue beyond this, it becomes fragmented over repeated V–I gestures. Also, the descent terminates on the first beat of the measure, the strongest of any of the linear descents in the S-zone. Therefore, m. 63 seems the best candidate for an EEC-substitute (marked as "EEC?" in the example), with the following material being a kind of backward-looking, S-based codetta ("codetta as S-aftermath?").

[42] In such cases, we could consider the EEC-point as the *telos* of the S-zone, especially if it is highlighted by salient musical features such as a Picardy-third effect, a *fortissimo* dynamic, a striking new theme, a significant reworking of earlier expositional material (such as P), etc.

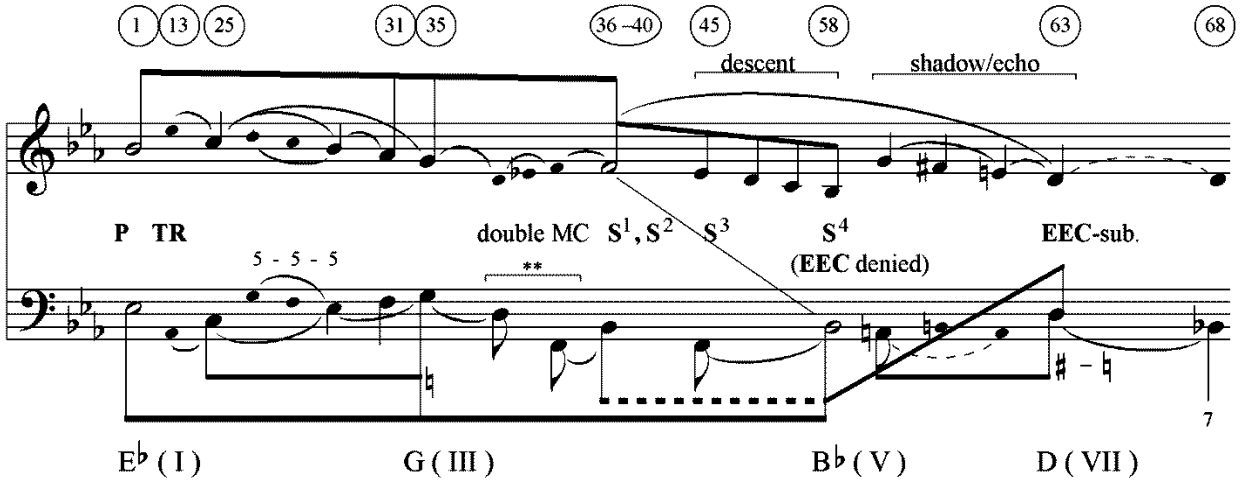
Example 3–23. The entire S-zone of the op. 51 quartet. An EEC in E♭ is denied in favor of an EEC-substitute.



Although D major (VII) seems an odd choice as an articulative key area in a sonata-form piece in E♭ major (certainly a "wrong" key, even by nineteenth-century standards), there is an underlying logic in its use. A deep-middleground graph reveals the key areas of this piece as a large-scale realization of the "nationalistic" E♭ major-seventh chord present in the first several

measures of the piece (see Example 3–24).[43] The modal decay of D major to D minor in m. 66 leads smoothly to the B♭7 chord of m. 68, a single chord that comprises the entire retransition to the expositional repeat.

Example 3–24. Op. 51, deep middleground of the exposition with compressed registers.



This "wrong" key ending the S-zone is reinterpreted in the recapitulation, which reverses the order of the S- and P-zones (the "double MC" of this work's expositional TR becoming a salient feature of the termination of the retransition to the recapitulation).[44] The move from E♭ to G major in the recapitulatory S-zone echoes the similar tonal move in the exposition's P-zone. Here, however, echoing the modal decay at the end of the exposition, G major turns to G minor and a progression of descending fifths follows in mm. 155–56, leading back to E♭ for the

[43] For further discussion of this piece, see pp. 251–57 and Examples 4–1, 4–2, and 4–3.

[44] Hepokoski and Darcy do not recognize the possibility of a "reversed recapitulation" when S is stated in the tonic before P. Rather, their Type 2 sonata describes a strategy in which during the course of the development, P is stated in a nontonic key (thus preserving the rotational logic of the expositional *Anlage*) and the S / C-zone acts as a *tonal resolution* leading to the ESC (for them, the term "recapitulation" itself is inappropriate in this formal context). Any following P will function as a post-cadential coda outside of sonata space proper. See *Elements of Sonata Theory*, pp. 353–87. I argue here that Dvořák's op. 51 quartet does indeed reverse the order of the S- and P-zones and that both can be considered recapitulatory.

recapitulation of P. Although the re-entrance of P at m. 156 is slightly complicated by its dominant harmonization, the true complication is the continuance of the  S-figuration in the first violin. It is as if the musical surface is telling us that S has not yet completed its generic mission to lead to the ESC, and indeed, no linear descent has yet happened (G is still the *Kopfton*).

In a typical sonata, the recapitulatory S-zone leads to the ESC. In the case of op. 51, however, since S does not lead to a satisfactory ESC but rather to an ESC-substitute a third higher, the recapitulatory S does not achieve the tonal closure required of the ESC. The S-figuration that persists into the following presentation of P helps define this P not as a coda but as a viable member of sonata space, a member whose job it is to complete what the recapitulatory S had started: a satisfactory perfect authentic cadence in the primary key.[45] This descent to the tonic happens very audibly in mm. 176–78, after which there is a P-based coda untroubled by S-figuration. Thus, this work exemplifies a recapitulation in which the deformation of the wrong-key EEC-substitute is normalized and the sonata is able to achieve a satisfactory close in the home key; in short, this is a "resolving recapitulation" as opposed to a nonresolving recapitulation despite the uncommon means it employs to achieve said resolution.

Expositions that lack an EEC.

Three expositions among Dvořák's mature works lack a convincing EEC or EEC-substitute: the Piano Trio in G Minor, op. 26; the Violin Sonata in F Major, op. 57; and the Piano Quartet in E♭ Major, op. 87. The lack of an EEC would seem to indicate a pessimistic outlook

[45] In this case, the ESC is reinforced by its congruence with the final descent of the *Urlinie*.

for a successful sonata closure through an ESC. That is, pieces with "failed expositions" are in danger of "sonata failure" due to the rotational or thematically parallel nature of the recapitulation. The manner in which the two works thwart the EEC is, however, entirely different. The Piano Trio has a continuous exposition lacking a medial caesura (a unique sonata strategy among Dvořák's mature works), while the Violin Sonata and Piano Quartet have typical two-part expositions. We will examine how each piece avoids expositional closure and the recapitulatory implications for such avoidance.

Piano Trio in G Minor, op. 26.

The Piano Trio has a clear primary motive, but the P-based transition dissolves into *Fortspinnung*-type material (what Hepokoski and Darcy refer to as TR → FS) around m. 48. A new, contrasting theme begins at m. 61. This might be a candidate for S, but it is tonally unstable, beginning as it does on the cadential six-four of B♭ major, and it lacks an EEC-as-*telos* later in the exposition that might allow us to understand it as a true S. Instead, this new theme continues to modulate, TR-like, until the recommencement of P material at m. 82. Dvořák continually flirts with G minor, the tonic key, in the latter part of the exposition, the climax of which is a Cm^7 chord (m. 104). We might anticipate (through the principle of *Mehrdeutigkeit* discussed in chapter 2, pp. 83–87) that this chord is either iv^7 of G minor, or, given the constraints of sonata style, ii^7 of B♭ major, the normative second key in G minor. Most surprising, then, is the cadential progression in D minor (v) at mm. 110–13. This is the only EEC-candidate in the latter half of the exposition, no other authentic cadences being even remotely present. Proportional to the preceding material, however, and given its abrupt

appearance, it seems much more a part of further modulation *within* the TR → FS space than the *culmination* of the energy of this space. Its *piano* dynamic (following a *diminuendo*) and, more importantly, the persistence of the melodic cell from m. 61 (the S-candidate) through m. 117 serve to overwrite the potential EEC-candidate of m. 113. The latter measure could be understood as a highly flawed EEC-substitute, but it seems not to rise even to this level of expositional semi-failure.

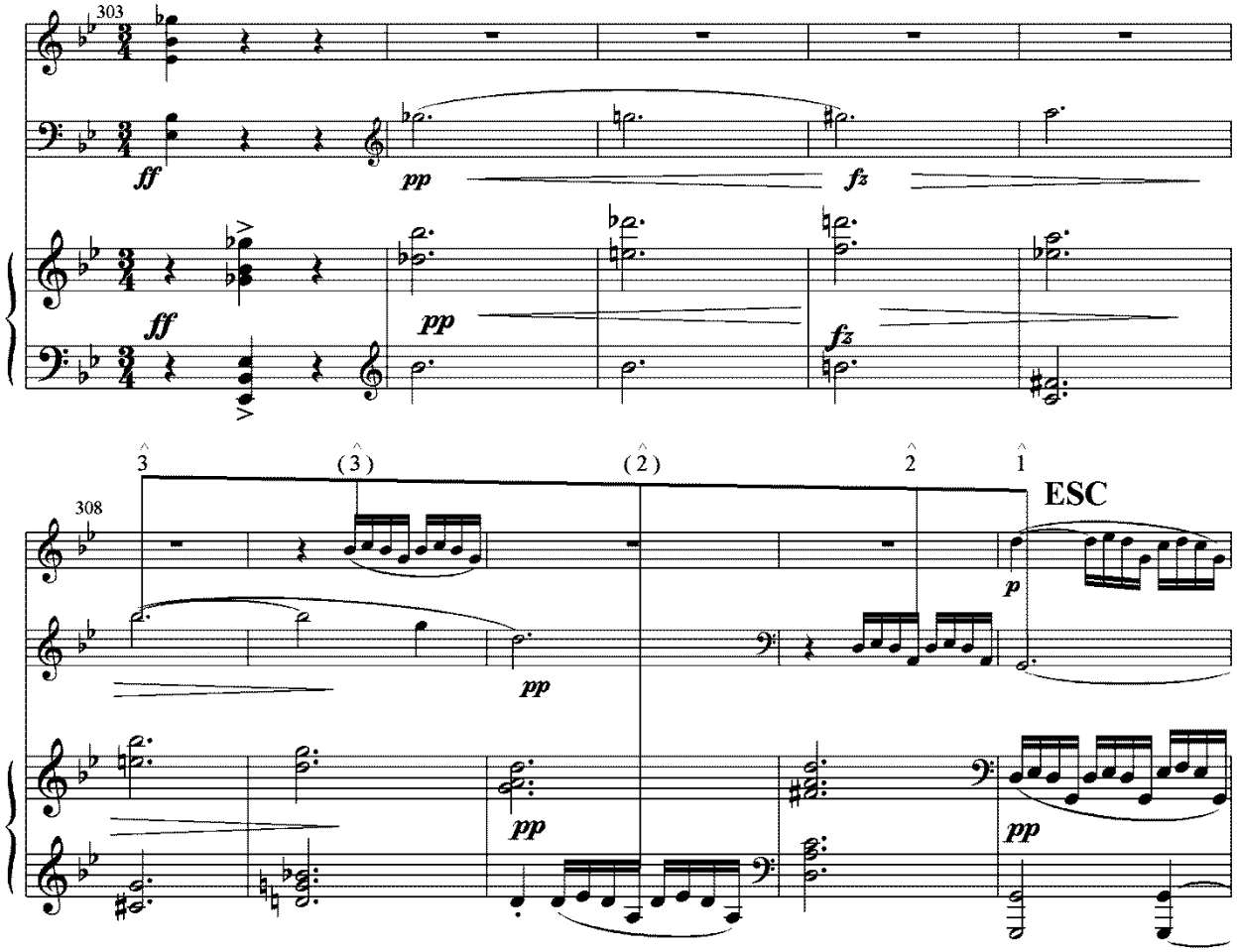
In the recapitulation, the TR → FS module is expanded by developmental pockets (roughly mm. 241–49 and 278–84). The first attempt to achieve a PAC in G minor is thwarted by a deceptive resolution at m. 288 (V^7–VI). A powerful and convincing stepwise ascent in the bass prolongs the pre-dominant harmony from m. 288 (the deceptive resolution) to m. 303, changing mode in the process (VI → vi). The resolution of this pre-dominant to the ESC in mm. 303–312 is shown in Example 3–25.[46] A relatively brief P-based coda follows, securely grounded in G minor.

Because the exposition lacked an EEC, Dvořák had to massively recompose the material of the recapitulation to achieve sonata closure. Although he preserved the general thematic order of the exposition in the recapitulation, he also left out large chunks of its latter portion, inserted the two developmental pockets identified above, and created a cadential drive to the ESC. Without these changes, the sonata might well have ended as the exposition did; tonal closure would have had to wait until the coda. As it stands, the sonata is generically successful in spite of the EEC-failure of its exposition.

---

[46] Notice that the $\hat{2}$ of the *Urlinie* is in the bass. Such occurrences are explored in Eric Wen's "Bass-line Articulations of the *Urlinie*," in *Schenker Studies* 2, ed. Carl Schachter and Hedi Siegel (New York: Cambridge University Press, 1999), 276–297.

Example 3–25. ESC of the Piano Trio in G Minor, i, mm. 303–312. The bass voice articulates the $\hat{2}$ of the *Urlinie*.



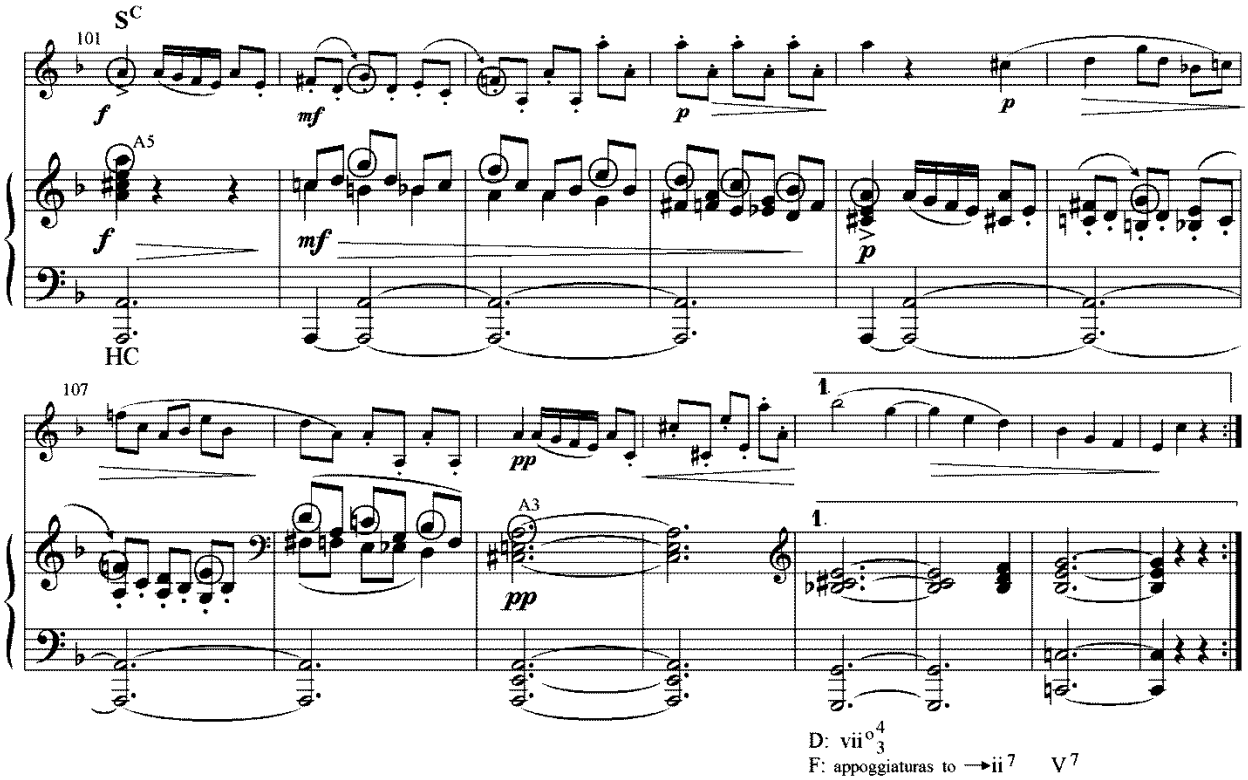
Violin Sonata in F Major, op. 57.

The other first movement with no EEC is the Violin Sonata in F Major, op. 57. As discussed earlier in this chapter (pp. 165–66), this piece has a relatively clear MC and a second group beginning in D major (VI).[47] Like Mozart's *Prague* Symphony, the S-zone of the Violin Sonata has many modules; unlike the Mozart symphony, however, Dvořák's sonata cannot seem

[47] See also the discussion of this piece in chapter 4, especially pp. 256–64.

to find a good place to cadence. Sequential areas of the expositional S-zone lead to a tonicized B♭ (m. 83) and a standing on the dominant of D major (m. 101). These quasi-developmental sequential areas—descending fifths at m. 64ff and falling thirds at m. 89ff—give the S-zone a broad, wide-ranging feel. A cadence in D major would not have felt out of place at the end of it all (similar to the wide-ranging S-zone of the String Quartet in D Minor, op. 34). Yet Dvořák chooses to stall harmonic action in m. 101 on an A major chord (V of D). This gives the entire exposition the same harmonic trajectory as the opening phrase: F major moves through D (either major or minor) to a half-cadence on the dominant of D major/minor (refer to Example 4–4 on p. 257).

Example 3–26. Violin Sonata in F Major, op. 57, i, mm. 101–14. The exposition lacks an EEC, which is replaced by a large-scale half cadence.



Without a PAC, we must say that there is no EEC in the Violin Sonata. Nevertheless, Dvořák is able to give the listener some sense of closure as well as sectional division: the music from m. 101 onward is a half cadence writ large and, by definition, all cadences provide a point of rest. That is, while simultaneously withholding full closure, half cadences indicate a temporary cessation of forward harmonic progress (compare with the D-minor authentic cadence in the op. 26 piano trio, m. 113, which does not seem to provide cessation of any kind). Besides the dominant pedal that follows the half cadence, two other elements add to the sense of relative finality: 1) the closing rhetoric of m. 101 onward, which we can label S^{C}; and 2) a two-octave descent from A5 to A3 in this same stretch of music (see the circled notes in Example 3–26).

The recapitulatory S-zone is almost an exact transposition of its expositional counterpart, which would seem to place the entire sonata in danger of failing its generic mission to secure an ESC. An important recomposition, however—the only change in the *Anlage* from the exposition to the recapitulation—occurs at mm. 279–80, which is an analog of mm. 100–101 (see Example 3–27). The functional analysis of both passages hinges on the harmonic interpretation of vii^{o7}, a chord that contains elements of both Dominant and Subdominant functions.[48] In the expositional material leading up to m. 101, $vii^{o}{}_{2}^{4}$ is treated as a Subdominant elaboration before the half-cadential Dominant ($iv \rightarrow vii^{o}{}_{2}^{4}$). The bass in particular, with its $\flat\hat{6}$–$\hat{5}$ resolution, highlights the Subdominant role of $vii^{o}{}_{2}^{4}$ (see the bracket in Example 3–27a); in Harrison's terminology, this melodic motion defines the characteristic discharge of the Subdominant agent onto the Dominant base.[49]

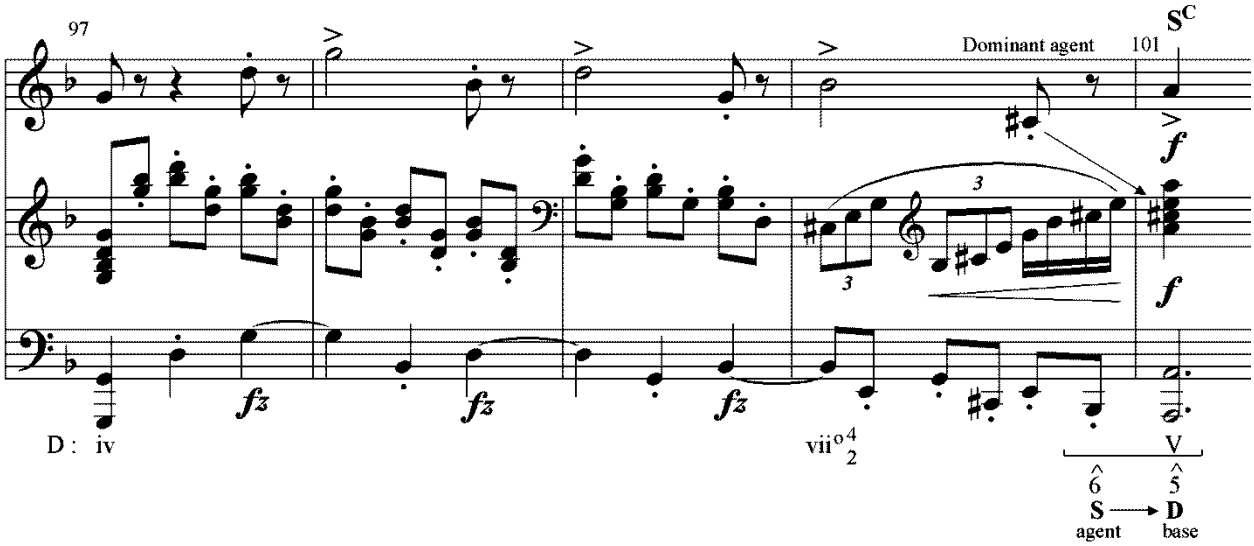
---

[48] For the following argument, I draw on concepts from Daniel Harrison, *Harmonic Function in Chromatic Music*.

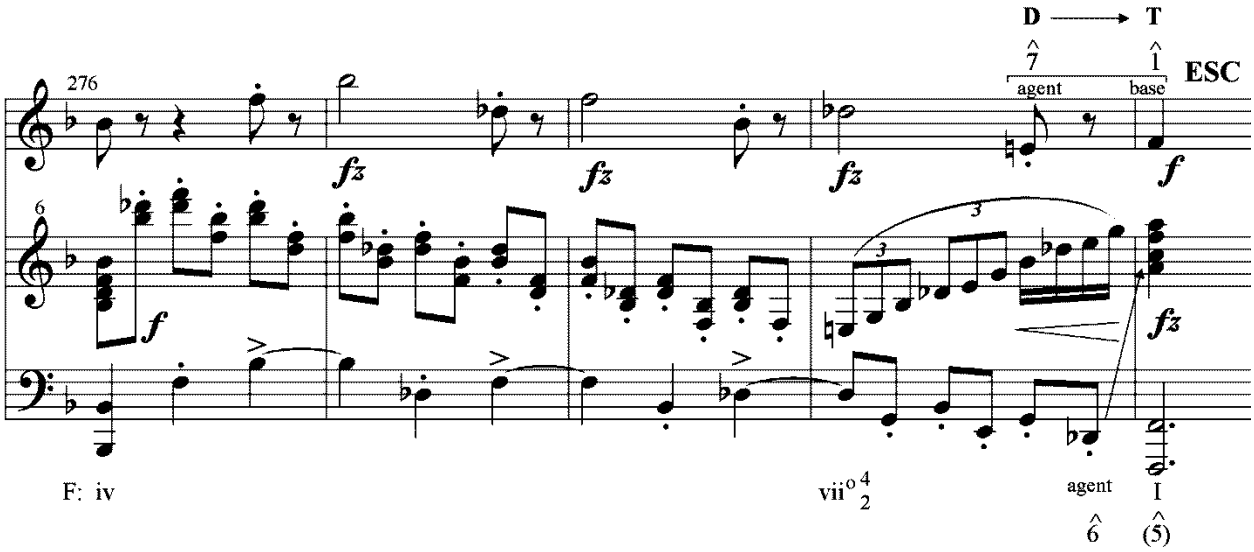
[49] At m. 101 the Dominant agent, C♯, does not discharge to D but is instead held over into the following chord (shown by the arrow in Example 3–27a).

Example 3–27.

a. Violin Sonata in F Major, op. 57, i, mm. 97–101. Subdominant discharge onto the A-major chord that begins S^C.



b. Violin Sonata in F Major, op. 57, i, mm. 276–80. Dominant discharge onto the F-major chord that signals the ESC.



In contrast, the recapitulatory material leading up to m. 280 recasts vii^{o4}_{2} as a dominant-substitute that leads to tonic resolution. In this case, the Dominant agent, E, is heard as discharging onto the Tonic base, F, in m. 280 (see the bracket in Example 3–27b).[50] These salient outer-voice discharges alter our perception of the expository and recapitulatory functions of vii^{o4}_{2}, reinforcing the multiple meaning (*Mehrdeutigkeit*) inherent in this multivalent chord. In the Violin Sonata, as in the op. 34 quartet, the ESC is articulated not by a root-position cadence, but by melodic factors and our perception of the discharge of harmonic functions.

Finally, whereas the two-octave descent from A5 to A3 in the exposition remained part of S as a prolongation of the local dominant, in the recapitulation the two-octave descent serves as a post-cadential closing gesture. The presence of G♭ gives the C-zone a Phrygian cast, but does not disturb the perception of F as the tonic.[51] Indeed, we might hear the G♭ as a large-scale counterbalance to the F♯ of the opening motive. This reading is made explicit in the coda, mm. 296–99, where F♯ in the bass (supporting V^6/ii) is enharmonically respelled as G♭ (supporting a tonic-resolving augmented-sixth chord).[52] After the resolution of the augmented sixth, the harmony remains locked on the tonic, consisting only of cadential iterations over a tonic pedal point.

---

[50] In this case, the Subdominant agent discharges onto the Tonic associate elsewhere in the texture, as shown by the arrow in Example 3–27b.

[51] Compare Dvořák's treatment here to the Phrygian-inflected octave descent that begins Brahms's Clarinet Sonata in F Minor, op. 120, no.1 (written in 1894, fourteen years after Dvořák's sonata).

[52] A similar case can be found in the retransition of the first movement of Brahms's Third Symphony (1883), m. 119, which also uses a G♭ augmented-sixth chord resolving directly to the F tonic. The first movement of Brahms's op. 120, no. 1, also has a significant Phrygian descent, mm. 134–36, in which the notated bass F♯ is made to stand in for G♭. It is probably coincidental that all three pieces are in F major or F minor.

Piano Quartet in E♭ Major, op. 87.

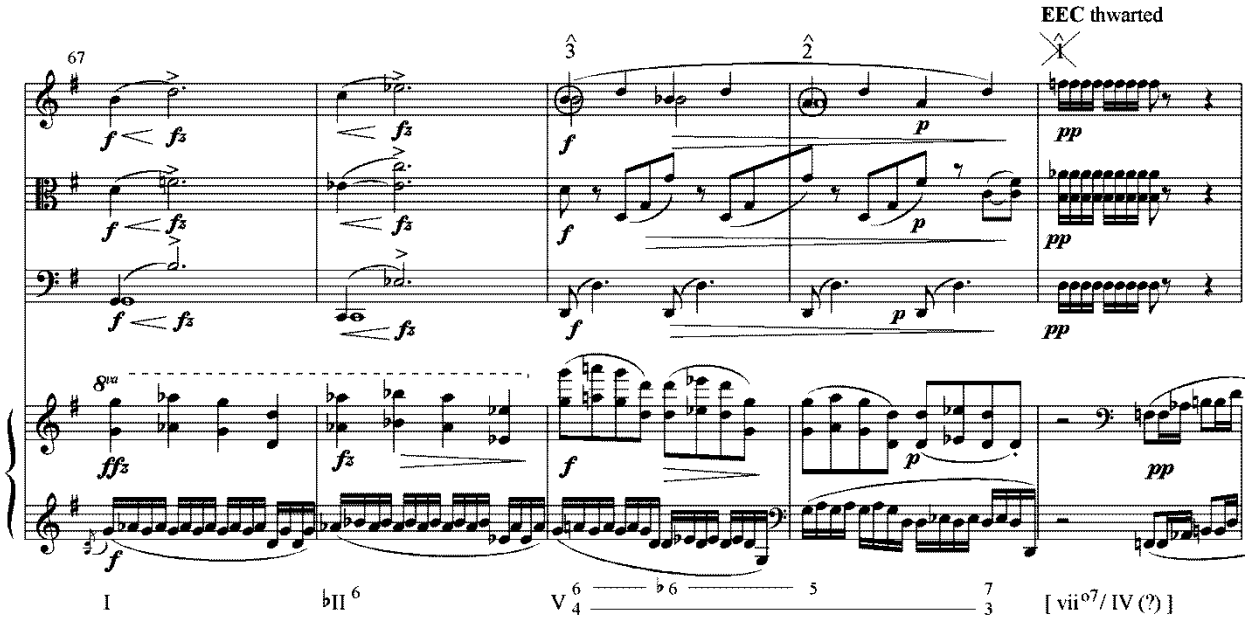
The Piano Quartet in E♭ Major is not as difficult a case as the two prior examples. We understand clearly that an EEC-moment has been suppressed or overwritten at m. 71 (see Example 3–28). We expect the terminal local tonic note (G4) of a $\hat{3}$–$\hat{2}$–$\hat{1}$ descent at this point, the violin clearly stating B4–(C5)–B4–(B♭4)–A4 over a I–♭II^6–V^6_4–V^7 progression in mm. 67–70. A *pianissimo* B^{o6}_5 thwarts the completion of the cadential progression and begins a retransition back to E♭ major, as if for an expositional repeat.[53] Thus, the exposition fails its generic mission to secure tonal closure. In a very subtle way, Dvořák has prepared us for this moment by writing a long *diminuendo* in mm. 69–70, softening the psychological impact of the moment of EEC-suppression.

At the analogous spot in the recapitulation, mm. 192–96, Dvořák indicates a *crescendo* to *fortissimo* while simultaneously completing the $\hat{3}$–$\hat{2}$–$\hat{1}$ descent. The successfully attained ESC at m. 196 can thus be heard as redeeming the thwarted EEC of the exposition. Flush-juxtaposed with the ESC, the coda presents a fully harmonized diatonic version of P at a jubilant *fortissimo* dynamic. This tonally unproblematic P-quotation might be seen as a kind of *denouement*, a P with all the kinks worked out, so to speak. As a goal of the tonal narrative of the piece, we might refer to this de-knotted P as the P-*telos*. Dvořák had similarly rewritten P in the coda of the first

[53] In actuality, however, this is the beginning of the development; the return to P in E♭ major only feints toward an expositional repeat. It is fairly common for Dvořák to employ this strategy in pieces that lack repeat signs at the end of the exposition (as can be seen in Example 3–1).

movement of the Piano Quintet in A Major, op. 81, just two years earlier (see pp. 220–226 below).[54]

Example 3–28. Piano Quartet in E♭ Major, i, mm. 67–71. The EEC is thwarted by a diminished-seventh chord that displaces the tonic.



Nonresolving recapitulations and the role of the coda.

The preceding section provided examples of how a failed exposition may yet produce a generically successful sonata: an ESC is attained despite the close adherence of the recapitulation to the *Anlage* of the EEC-less exposition. In contrast, the following section addresses sonatas that successfully complete their generic mission to attain expositional closure but then somehow fail to do the same in the recapitulation. In Dvořák's mature works, there are four sonata-form first movements that follow this strategy: the String Sextet in A Major, op. 48;

[54] The *locus classicus* of the P-based coda as *telos* is the first movement of Beethoven's Eroica. See Hepokoski and Darcy, 286–87, where other authors' views on this coda are also cited.

the String Quartet in C Major, op. 61; the Piano Quintet in A Major, op. 81; and the Symphony no. 9 in E Minor, op. 95.

String Sextet in A Major, op. 48.

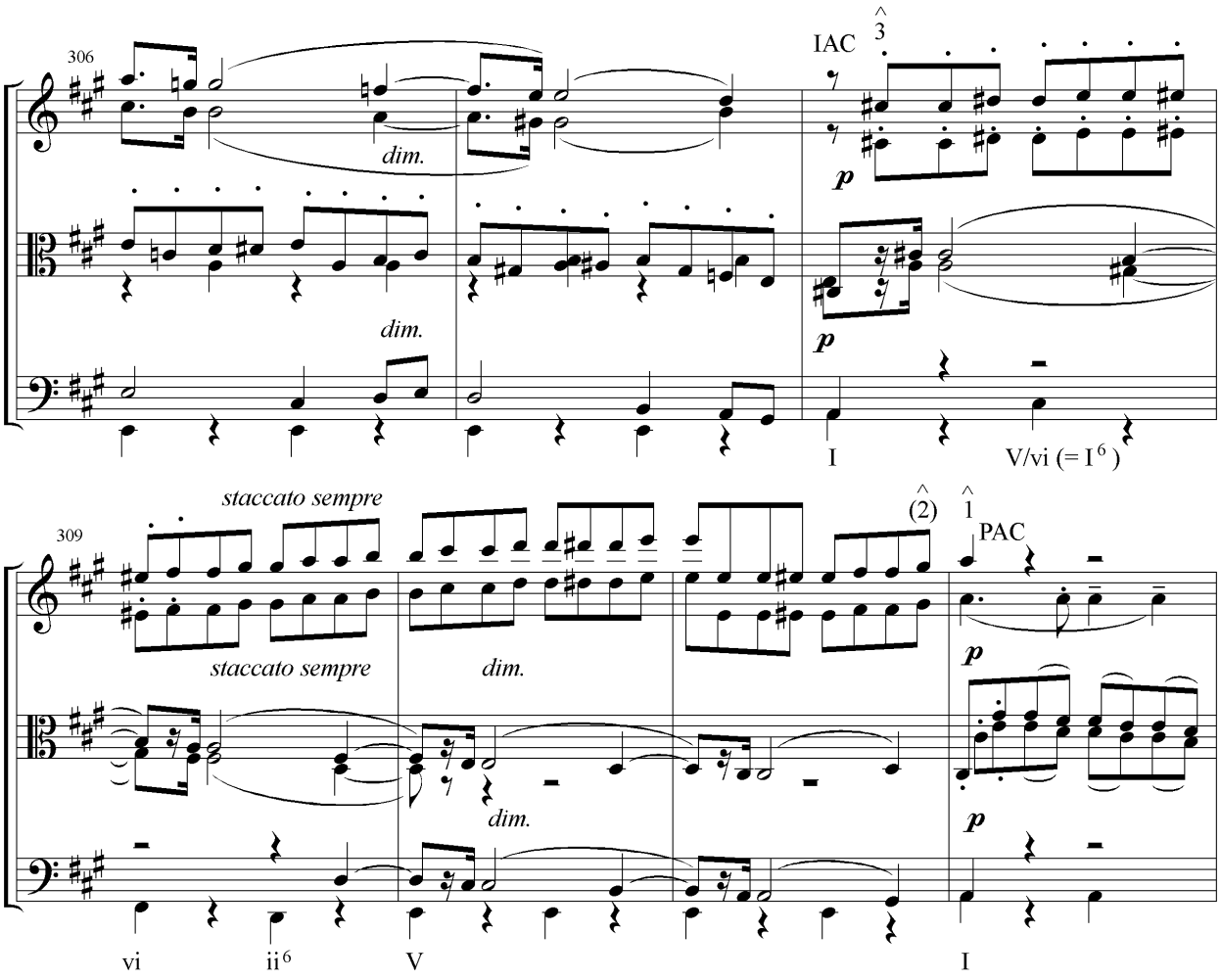
As we have already explored above (pp. 201–204), the EEC of the String Sextet was problematic, occupying a point within a larger swath of music defined by S-derived material. Beginning at m. 227, the entirety of S is recapitulated a fifth lower; the moment analogous to the EEC happens at m. 276 and is followed by the same C-modules as were heard in the exposition, including the modal decay to the parallel minor. Although this ESC-substitute is capable of triggering sectional division in its role as a rhetorical close, it cannot be considered the true ESC because it is in the wrong key of F♯ major (VI). While the recapitulatory VI:PAC provides axial balance to the expositional III:PAC (in that VI is a third below the tonic whereas III is a third higher), fifth-transposition alone is not enough to bring the recapitulatory S into a "closer relation to the tonic," still less to provide essential sonata closure.[55]

The failure of the sextet to come to a satisfactory tonal close at the EEC-analog means that we must understand the beginning of the coda is to be signaled by rhetorical means: the start of a new, P-based rotation, not a post-cadential confirmation of tonic accomplishment. The coda begins on a six-four chord, much as the expositional TR did, and leads to an IAC at m. 308 (with $\hat{3}$ in the upper three voices). The PAC at m. 312 completes the tonal descent as shown in

[55] This "closer relation," one of the tenets of Edward Cone's "sonata principle," has been debunked by James Hepokoski in "Beyond the Sonata Principle," *Journal of the American Musicological Association* 55, no. 1 (Spring 2002), 91–154. Cf. also Hepokoski and Darcy, 242–45, and Hepokoski "Back and Forth from *Egmont*."

Example 3–29. The remainder of the movement is basically a fourfold repetition of what William Caplin terms an *expanded cadential progression* (ECP), here used postcadentially.[56]

Example 3–29. String Sextet in A Major, op. 48, i, mm. 306–312. Complete melodic closure is delayed until m. 312.



[56] The ECP typically supports a phrase (most often with I^6 as an initiating chord followed by a pre-dominant) that is four measures or longer. See William Caplin, *Classical Form:*, 20. Dvořák's six-measure phrase is based on a telescoped descending-fifth cycle: I–(V–I)–V/vi (=I^6)–vi–V/V (or ii^6)–V–I. This is a variant of the $\hat{3}$–$\hat{4}$–$\hat{5}$–$\hat{1}$ bass line of the prototypical ECP.

Is there an intrinsic musical reason that might have prompted Dvořák to end his recapitulation away from the tonic? After all, within his style a nonresolving recapitulation was still deformational, or at best a lower-level default (compare the various recapitulatory strategies shown in Example 3–1). In Robert Hatten's terminology, nonresolving recapitulations are *marked* with respect to Dvořák's normal operating procedures and thus invite further reflection upon Dvořák's compositional decisions.[57] One possible answer to the above question might be found in the tonal outline of the P-zone itself. The first cadence of the piece, at m. 12, is a Picardy-third effect in F♯ major, flush-juxtaposed with the beginning of P^2. A developmental portion, $P^{2.1}$, begins at m. 21 with a foreshadowing of the main motive of S in A minor but cadences in C♯ major at m. 27, foreshadowing the key of S. This IAC is also flush-juxtaposed with the beginning of P^3, which itself leads to a cadential six-four at m. 41 and the beginning of the P-based transition (which serves as a tonic counterstatement of P^1, albeit over a dominant pedal). Thus the main harmonic areas of the P-zone (A–F♯–C♯) are a reordered microcosm of the harmonic areas of the entire sonata. In a similar way, by the time the tonally discursive P-zone returns to A major (over a dominant pedal), the transition has begun, and by the time the tonally discursive sonata (i.e., the nonresolving recapitulation) returns to A major (over a dominant pedal), the coda has begun.

Piano Quintet in A Major, op. 81.

The Piano Quintet and the String Sextet are the only sonata-form works of Dvořák's maturity that are in A major. It is perhaps not entirely coincidental that they share certain traits.

[57] See Robert Hatten, *Musical Meaning in Beethoven*.

Both move to some version of the mediant for the S-zone and both recapitulate this theme in the modally matched submediant. The String Sextet's expositional S is in III (C♯ major) and its recapitulatory S is in VI (F♯ major), while the Piano Quintet's expositional S is in iii (C♯ minor) and the recapitulatory S is in vi (F♯ minor). Both have nonresolving recapitulations and codas in which the tonic return is made. Unlike the Sextet, however, in which the P-zone forecasts the key area of the recapitulatory S and thus provides a justification for its nonresolving recapitulation, we must look elsewhere to discover the compositional logic of the nonresolving recapitulation in the Piano Quintet.

The EEC of the Piano Quintet is very clearly articulated in C♯ minor at m. 149; its linear descent is shared between the first violin and the piano, aided by voice exchanges; see Example 3–30. This is followed by a short codetta over a tonic pedal that basically articulates a descending octave scale. Recapitulatory S-space is a wholesale transposition of expositional S-space down a fifth, with the analog of Example 3–30 starting at m. 381 and the strong ESC-substitute occurring at m. 383. Whereas the exposition had a key-confirming codetta after the EEC, the analogous codetta-space at the end of the recapitulation is reworked so that instead of confirming F♯ as a local tonic it leads away from it, beginning what Hepokoski and Darcy call a *discursive coda*, a lengthy stretch of music that is often multisectional.[58]

The coda of the Piano Quintet is unlike that of the sextet. Recall that the sextet used the reintroduction of P-material to rhetorically signal that the coda had begun. Indeed, since this P-material began over a cadential six-four, tonic achievement is unproblematic, becoming almost a *fait accompli*. In the Piano Quintet on the other hand, there is no comparable signal that coda-

[58] "When a coda is lengthy, we refer to it as a *discursive coda*. This term conveys the sense that it unfolds a separate, often multisectional discourse beyond sonata space." They note that while some discursive codas are solely P-based (representing an incomplete rotation), others make a move toward a full rotation of musical materials by including elements of S and/or C (as Dvořák does in the Piano Quintet). Hepokoski and Darcy, 284–88.

space has been entered. Rather, as soon as we hear the bass descend in m. 385 (something not analogous to the expositional *Anlage*), we begin to understand that the recapitulatory codetta is transcending its origins and becoming something more important: namely, a full-blown coda. Indeed, the sense of tonal instability is heightened at m. 391 when the melodic goal, F♯6, is undercut by a B♯ diminished-seventh chord. Moving up by half-steps, the bass finally arrives at a cadential six-four chord of A *minor* in m. 401, followed by a four-measure dominant in which the minor coloration is retained.[59] This tension discharges in a powerful, *fortissimo* statement of an unexpectedly transformed version of P in A major at m. 406 (see Example 3–31).

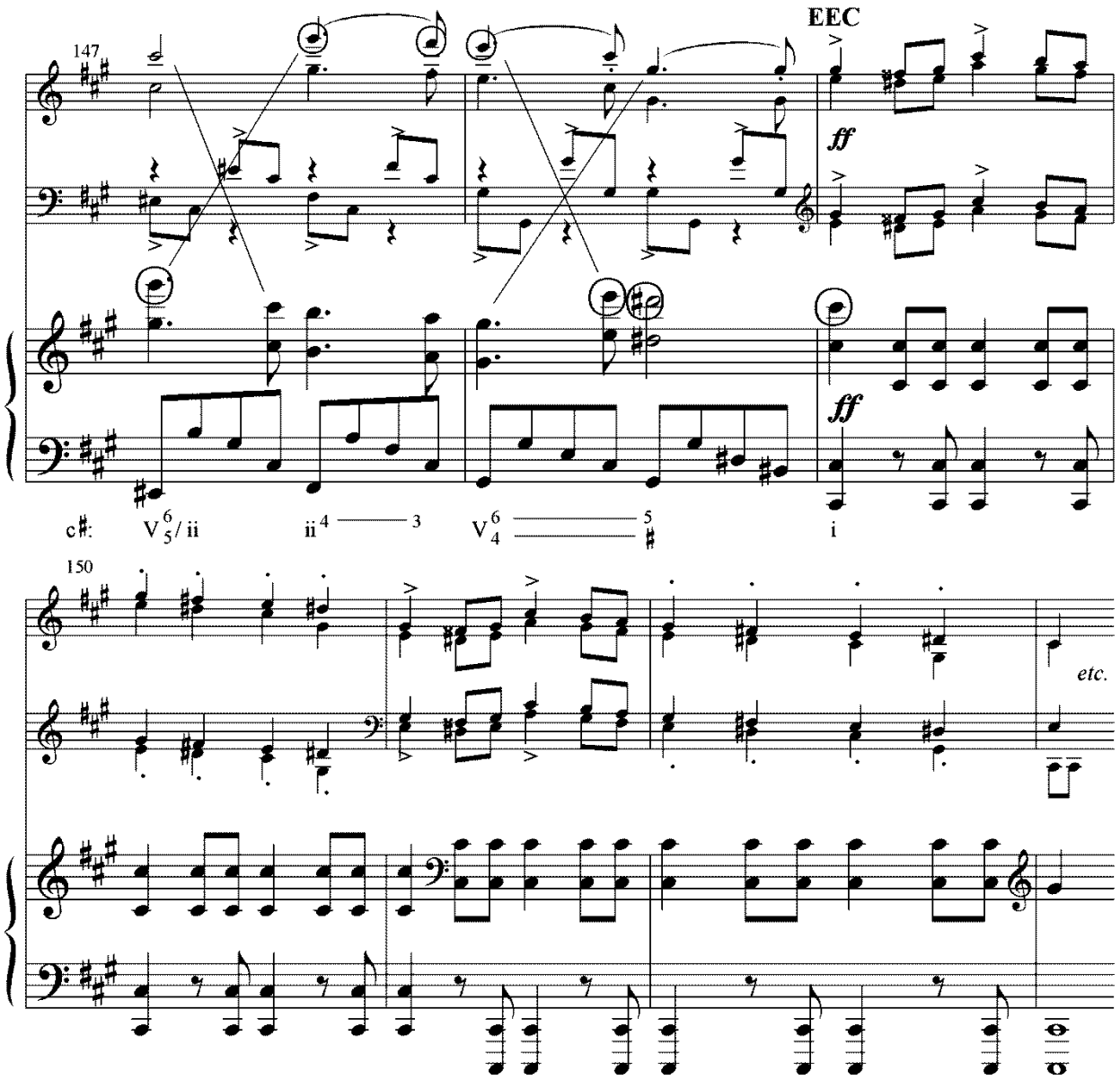
That the tonic arrives with a rhythmically transformed version of P, that this transformed P provides a Picardy-third-like resolution to the preceding minor six-four chord, and that the coda began with harmonically unstable, tension-heightening material mean that the P-theme of m. 406 has a triumphal, valedictory cast to it, one we might refer to as a "breakthrough" (*Durchbruch*).[60] A breakthrough usually comprises some sort of new or transformed theme and typically occurs after some sort of musical "struggle" (here, the tonal instability of the coda's beginning and the dire modal implications of the minor cadential six-four at m. 401). In Dvořák's Piano Quintet, this breakthrough is the goal, or *telos*, of the coda, and I will refer to this version of the P-theme as the P-*telos*. When a breakthrough/*telos* happens within coda-space, it might be said that the coda is somehow commenting on some deficiency of sonata-space proper.

---

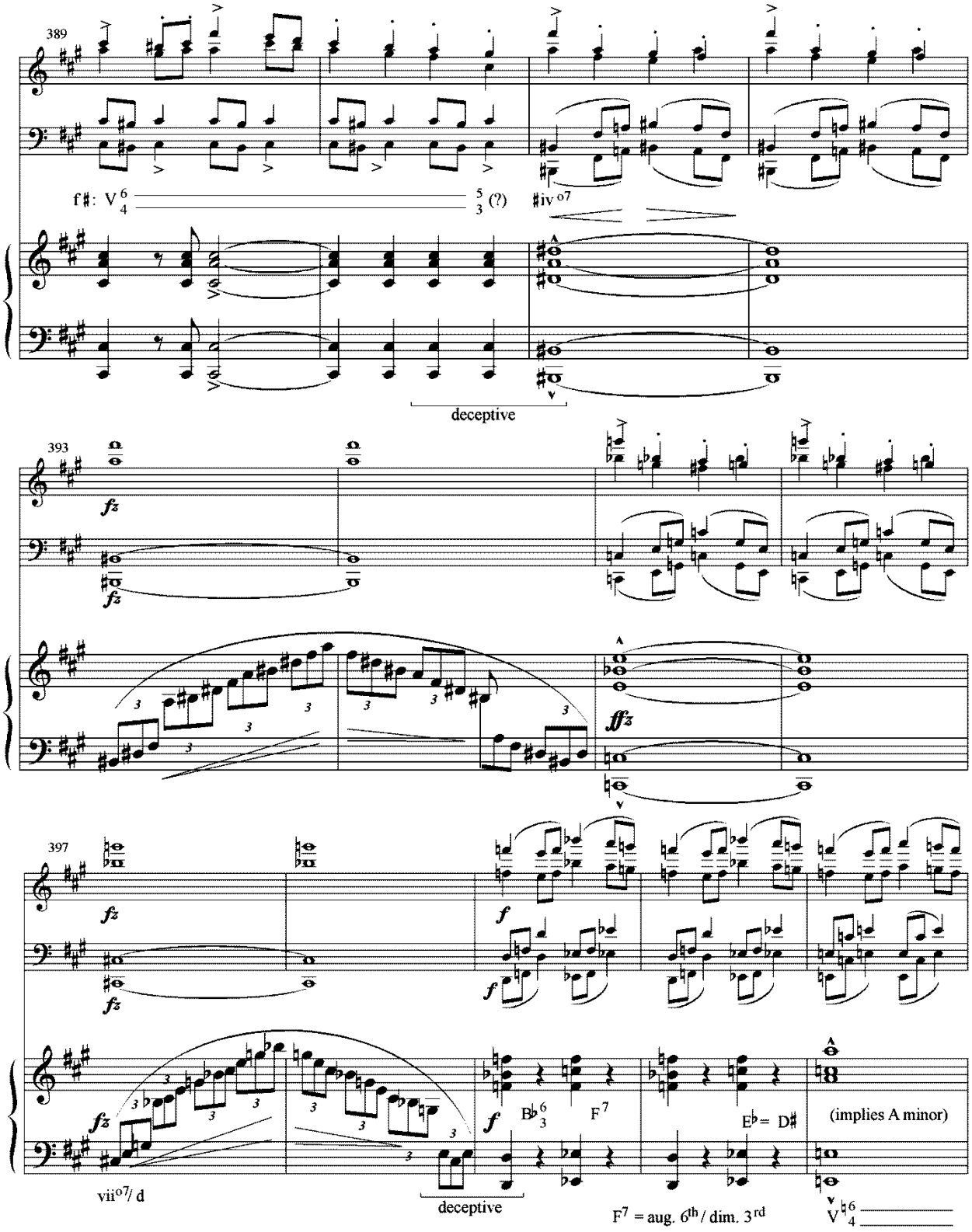
[59] The manner in which Dvořák moves up by half step—where at first the bass remains stationary (B♯ = C) while the three upper voices move by semitone (m. 398) and then the upper voices remain stationary while the bass ascends by semitone (m. 400)—is reminiscent of Schubert's practice as discussed by Brian Newbould in *Schubert. The Music and the Man* (Berkeley: University of California Press, 1999), esp. 396–98. Newbould mentions that this process appears in Dvořák's Eighth Symphony.

[60] The term was coined by Paul Bekker in regard to the finale of Mahler's Symphony no. 1 in D Minor, and the issue has been explored more recently by Hepokoski in "Fiery-Pulsed Libertine or Domestic Hero?: Strauss's *Don Juan* Reinvestigated," in Bryan Gilliam, ed., *Richard Strauss: New Perspectives on the Composer and His Work* (Durham and London: Duke University Press, 1992), 135–75, and Timothy Jackson, *Tchaikovsky: Symphony no. 6 (Pathétique)* (Cambridge: Cambridge University Press, 1999), 24.

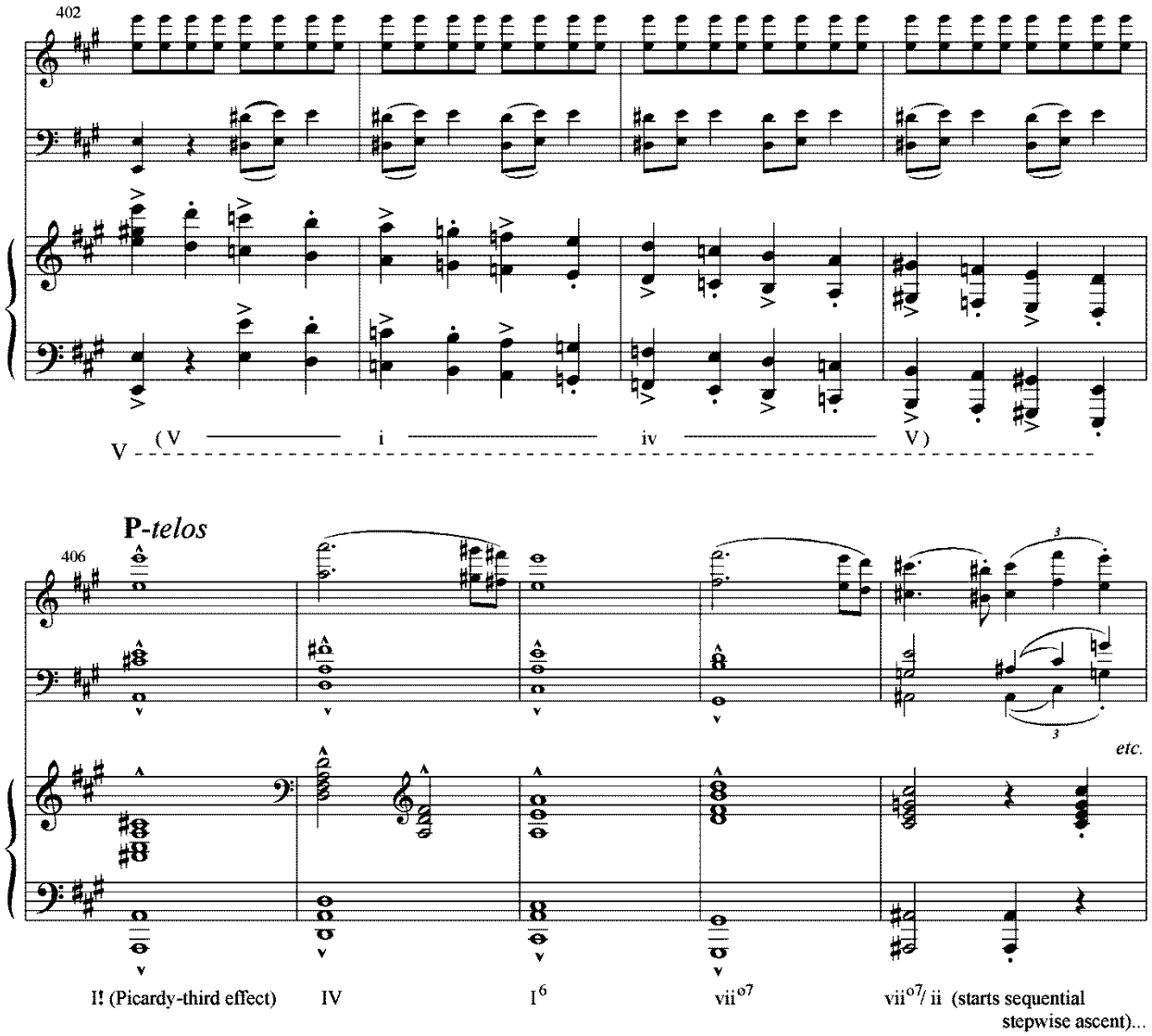
Example 3–30. Piano Quintet in A Major, op. 81, i, mm. 147–153. Composite melodic descent (through voice exchange) to the EEC.



Example 3–31. Piano Quintet in A Major, op. 81, i, mm. 389–410. Discursive coda leads to a fully diatonic version of P in the tonic.



Example 3–31. continued.



In this case, we can understand the P-*telos* breakthrough as suggesting that the major-to-minor modal decay inherent in the original P rendered it somehow unsatisfactory for the primary group of a major-mode sonata; that is, the original P embodies a failure of nerve, so to speak, its collapse to the parallel minor projecting *Angst* and uncertainty as primary *topoi*. The P-*telos* forcefully asserts a heroically major-mode victory over these negative *topoi* as represented by the

modally defective P, the minor-mode EEC and ESC-substitute, and the agitated (panic-stricken?) codetta-idea that follows both of these cadences. The emphatic tonic-major underpinning of the P-*telos* is also an indictment of the inability of the non-tonic recapitulatory S-space to achieve full sonata closure. Indeed, the diminished-seventh arpeggio at mm. 391–92 and the one that follows two measures later are analogs to the diminished-seventh arpeggios that signaled the beginning of the development (mm. 155–56 and 159–60), and as such, comprise a feint toward a second rotation through the development.[61] In this way, the P-*telos* of the coda acts as something of a *deus ex machina*, rescuing the generically unsuccessful sonata movement through its transformation and rehabilitation of P and its forceful re-establishment of the tonic major.

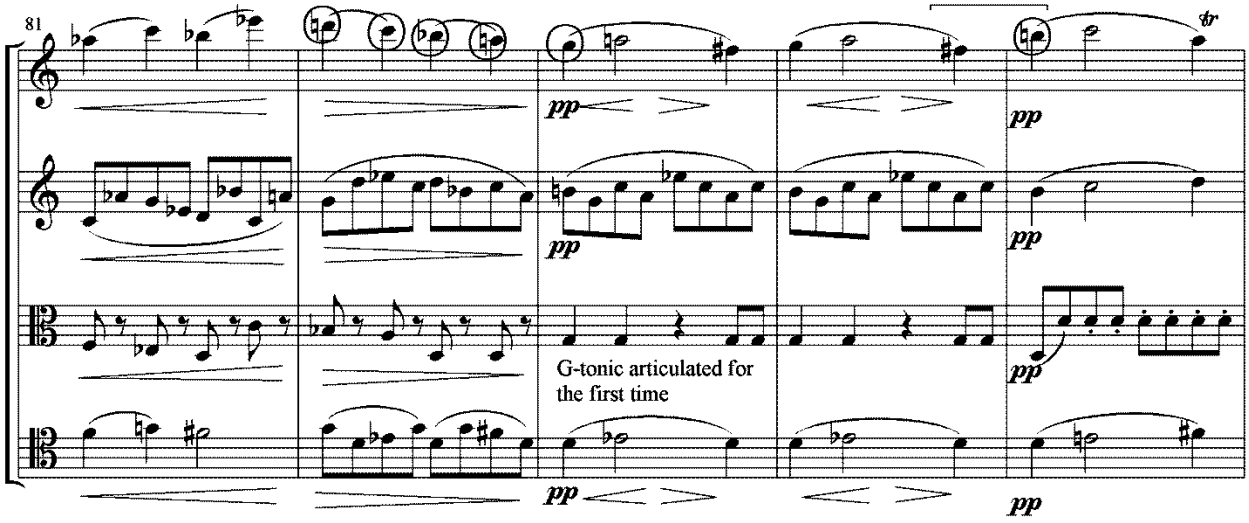
String Quartet in C Major, op. 61.

Although we will deal with the first movement of this quartet in its entirety in chapter 5, the EEC and recapitulatory ESC-substitute of this piece merit a close examination. After being prepared by a ♭III: HC MC (refer to Example 3–9a on p. 175), the expositional S-zone of this piece moves smoothly from E♭ major to G major. That is, G major is not prepared cadentially: it emerges from a preceding tonal area. Locating a "satisfactory" first cadence in G major is difficult. The best candidate occurs at m. 87, a seeming IAC. Hepokoski and Darcy allow that an IAC can function as an EEC but caution that "before one comes to this decision, the rhetorical signals surrounding this EEC-moment—particularly regarding the status of C—should be

[61] This is similar to the role of the coda in many of Beethoven's works, in which coda space is used to remedy unresolved tonal or formal issues introduced in the development section.

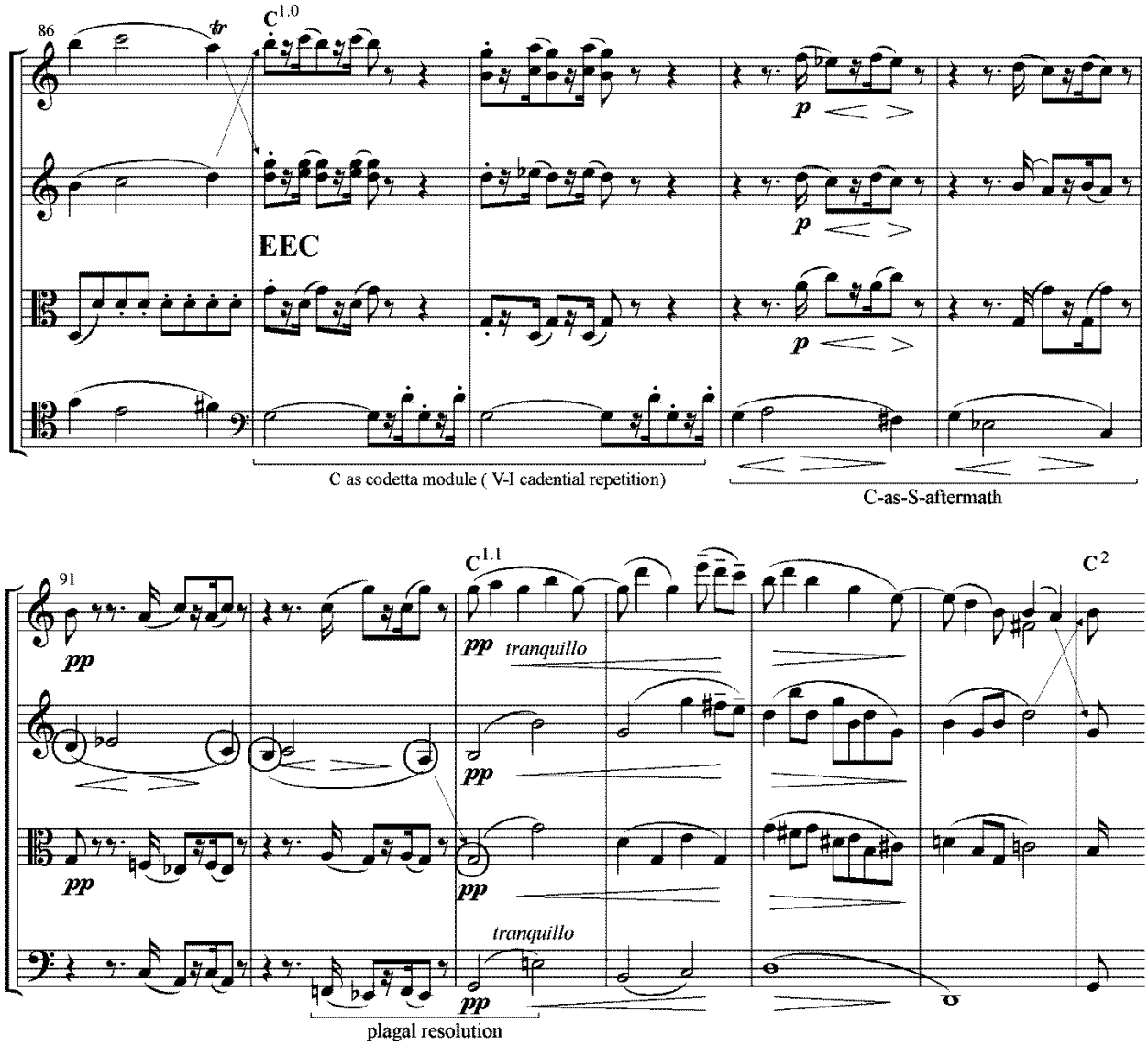
overwhelming…."[62] They point out that this IAC-type EEC may be only an *apparent* IAC, due to either a cover tone in a nonessential melodic voice at the cadential point or an elision with the beginning of a C-module that begins on the local $\hat{3}$ or $\hat{5}$. I believe that not only are there strong rhetorical signals in this quartet that m. 87 is the EEC, but also that its IAC is a type of "apparent IAC," masking a deeper-level resolution to the tonic note; refer to Example 3–32 for the following discussion.

Example 3–32. String Quartet in C Major, op. 61, i, mm. 81–97. The first descent to G occurs within a sequence; the EEC is only generically satisfied at m. 87.



[62] Hepokoski and Darcy, 167–69. They cite the first movements of Beethoven's Symphony no. 2 and String Quartet in E♭, op. 74, "Harp," as cases where an IAC functions as the EEC.

Example 3–32. continued.



Although there is a linear descent to G and an apparent PAC at m. 83, this descent can hardly be considered the EEC because of the persistence of S-rhetoric afterward. (The PAC is merely apparent because it is reached via sequential progression.[63]) It is notable, too, that at this point thematic liquidation begins; only the first two measures of the original four-measure S-phrase are used following m. 83. While the trills on A5 in mm. 85–86, seem to "resolve" to $\hat{3}$,

[63] Refer to Caplin's discussion of sequential vs. cadential progressions in *Classical Form*, esp. 24–31.

they could be considered evocations of the Classical practice of using a trill on $\hat{2}$ to signal an imminent PAC. Finally, if m. 87 is the EEC, $\hat{3}$ could be considered the main voice of an ensuing C-module, since it is precisely at m. 87 that "new" material is heard for the first time in the second half of the exposition (new material being a textural cue that typically indicates a cadence has occurred). All of these factors support the idea that G major is attained by m. 83 but only cadentially confirmed in m. 87 by an apparent IAC. The true melodic goal is the tonic note, G5, appearing in the second violin, where it resolves the leading tone that was left hanging at the end of m. 84.

Recall that Hepokoski and Darcy strongly suggest that the status of C should be considered when the EEC-candidate is an IAC. In the case of the op. 61 quartet, C begins as a hybrid of the codetta-type and the C-as-S-aftermath (see mm. 87–90, denoted by brackets in Example 3–32), including a linear fifth-descent harmonized by a plagal resolution (shown by the circled notes in mm. 91–93). A lengthy series of C-modules begins with a new theme at m. 93.[64] Regarding new themes for C, Hepokoski and Darcy say that the new theme "…may also take on salutary reinforcement work after an attenuated or not fully satisfactory EEC."[65] This quotation seems pertinent with regard to the P- and C-zones of the first movement of Dvořák's op. 61.

Notwithstanding some minor recomposition of the P-zone in the recapitulation, the S-zone in op. 61 is almost directly transposed down a third. That is, just as the expositional S began in E♭ major and cadenced in G major, Dvořák begins the recapitulatory S in C major at m. 232 only to sound the ESC-substitute in E major at m. 250. One could imagine a more normal

[64] Because these following modules confirm the G major tonic through authentic cadential repetition, they balance the plagal harmonization of the first C-module. Therefore, I have given the first C-module the relatively rare "$C^{1.0}$" designation. Because it is S-like, it functions like a codetta to the S-zone, but it is post-cadential and so, by definition, part of the C-zone. Also, since $C^{1.0}$ is not terminated by a cadence, it functions like a proclitic plagal preparation of the $C^{1.1}$-module at m. 93 (a C-module that is more normatively C-like).

[65] Hepokoski and Darcy, *Elements of Sonata Theory*, 186.

recapitulation in which S were recomposed to allow the cadence to occur in C major as well. As it stands, the nonresolving recapitulation pushes tonal resolution into the coda. Unlike several of the works discussed above, the op. 61 quartet has a tonally orthodox exposition (S in V). The nonresolving nature of its recapitulation is therefore even more striking than in works, such as the Piano Quintet, in which the recapitulatory S-zone is a fifth-transposition of a mediant key. We will fully explore the compositional logic behind this strategy—as well as the increased structural importance in this work of the development and coda—in chapter 5.

Symphony no. 9 in E Minor, op. 95.

Of all Dvořák's nonresolving recapitulations, that of the Ninth Symphony is perhaps the most unusual. To briefly review the other cases, in both the String Sextet and the Piano Quintet, the submediant key of the recapitulatory S is transposed down a fifth from the mediant key of the expositional S. This recapitulatory fifth-transposition is something that happens in Beethoven, most famously in the first movement of the "Waldstein" Sonata (where the submediant proves only fleeting, functioning as a large-scale upper neighbor to the dominant). In the case of the String Quartet in C Major, the nonresolving recapitulation, whose S-zone moves from I to III, can be explained as a large-scale rhyme of the exposition, whose S-zone moved from ♭III to V. The Ninth Symphony has an expositional S-zone that moves from iii to III (G minor to G major) and a recapitulatory S-zone that moves from ♯iii to ♯III (G♯ minor to A♭ major, an enharmonic respelling).

The upper strings articulate a clear but quiet melodic descent beginning at m. 144, leading to the EEC at m. 149; tutti *fortissimo* confirmation of G major is withheld until m. 171,

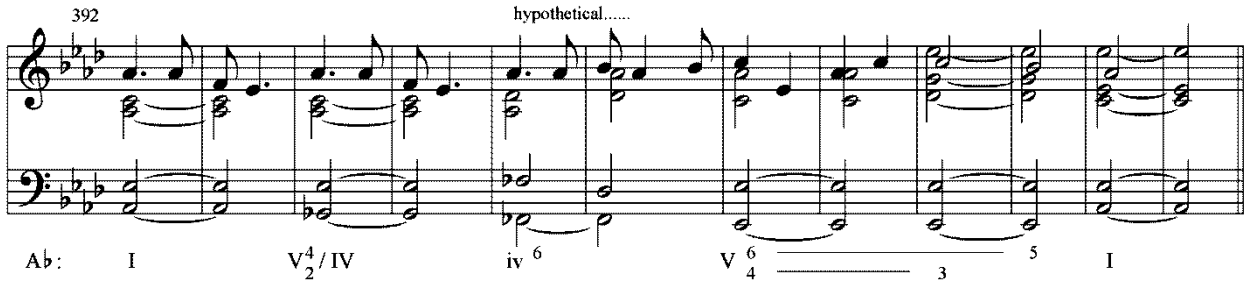
at the end of the C-zone. A brief codetta then merges with the retransition to the expositional repeat. The recapitulation includes a wholesale repetition of the expositional S-zone up a semitone, including the ESC-substitute in A♭ major at m. 370. Why would Dvořák choose to recapitulate his expositional S-zone up a semitone? Even according to late nineteenth-century standards this strategy is deformational. If we imagine that the mediant is a harmonic ramification or outgrowth of the tonic triad's constituent intervals (i.e., an unfolding to the tonic's upper third), then we can construe the tonal plan of the first movement as projecting an internal conflict between the two modalities of the tonic chord, minor and major respectively. In other words, by recapitulating the S-zone in G♯ minor/major it is as if a major-mode version of the E triad is struggling to assert itself; there is a dyadic conflict between G and G♯. In a complete performance of the symphony, after having heard the attainment of E major in the finale, we can retrospectively understand the first movement as foreshadowing the minor-to-major plan of the entire work (despite the modal collapse in the first-movement coda). In this case, the move from minor to major in each iteration of the S-zone is an echo of a large-scale harmonic plan at a shallower structural level.

As in the Piano Quintet, the first-movement expositional codetta of the Ninth Symphony is transformed into a discursive coda. Flush-juxtaposed with the culminating PAC of the C-zone, the coda seemingly begins at m. 392 with the melodic descent of the bass in whole tones (A♭–G♭–E♮), suggesting the onset of a lament-bass pattern in A♭ (see Example 3–33a for a hypothetical realization of such a progression). Surprisingly, the E in the bass does not support a version of the minor subdominant in A♭ but an A-major six-four chord (see Example 3–33b). This is not a cadential or passing six-four chord; it does not resolve to a root-position chord and seems a goal in its own right. Indeed, in another context, the A-major chord—understood as enharmonic to B

♭♭ major, the Neapolitan $\frac{6}{4}$ of A♭ major—could function as a clear goal: the deceptive resolution of an A♭ dominant-seventh chord (see Example 3–33c). As it appears in six-four position, however, this chord is a good example of what Robert Hatten calls an *arrival six-four*.[66] Dvořák further highlights this harmonic shift by immediately repeating the motive from mm. 392–95 (labeled *x* and marked by a bracket in the example) a semitone higher, ***fff*** and with accents.[67]

Example 3–33. The ESC-substitute and ensuing coda that re-establishes E minor as the tonic.

a. Ninth Symphony, hypothetical continuation of the lament-bass implication of the coda onset (m. 392).

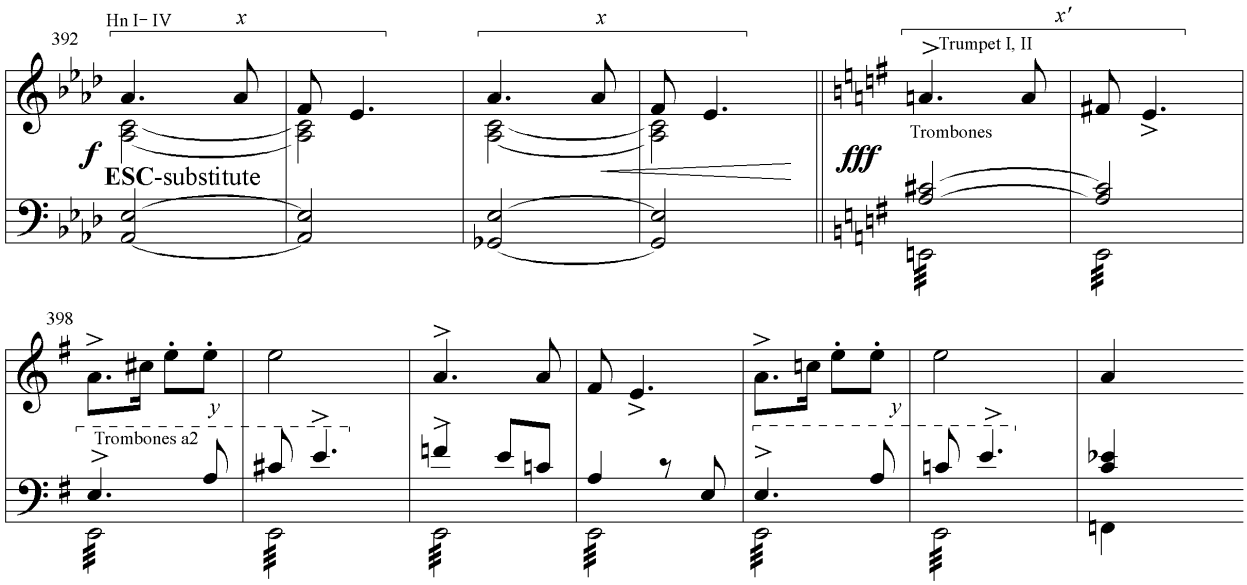


[66] This gives the material appearing over the six-four a "highlighted" effect, as if on a pedestal. Hatten, *Musical Meaning in Beethoven*, 15 and 21–28.

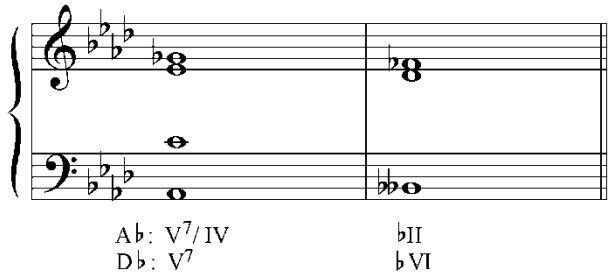
[67] The repetition of the motive up a half step with no intermediary chords at a sectional division reminds me of the similar effect in many jazz pieces and pop songs, in which the final chorus is harmonically highlighted by direct modulation up a semitone.

Example 3–33. continued.

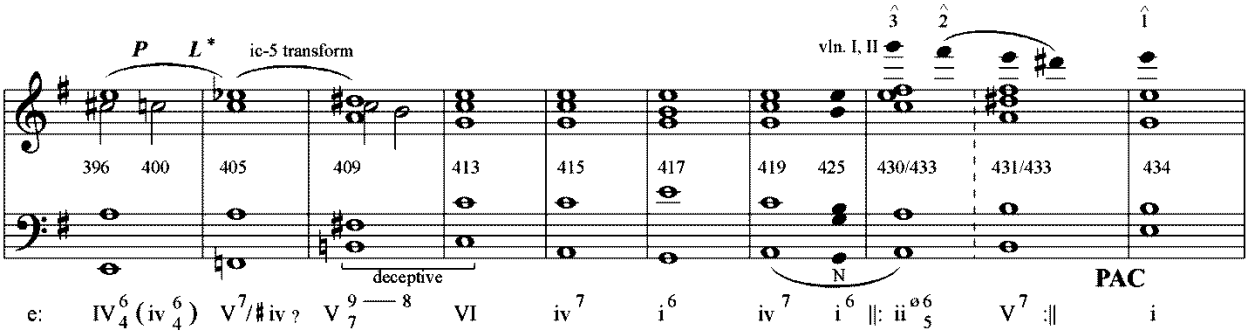
b. Ninth Symphony, score reduction of the ESC-substitute and beginning of the coda, mm. 392–404.



c. A major as a goal, enharmonically respelled as a deceptive resolution of A♭7.



d. Harmonic reduction of the six-four arrival to the first and only PAC of the coda.



Unlike the Piano Quintet, which had its P^1 recomposed to create the P-*telos* of the coda-breakthrough, the Ninth Symphony reintroduces the P^1 motive (labeled *y* in Example 3–33b and marked by the dotted bracket; note that *x* and *y* have identical rhythms) in its original contour. Because it appears over the arrival six-four at a *fortississimo* dynamic, however, the arrival of P^1 is "breakthrough-like" and strongly marked, inviting interpretation. One such interpretation could construe the arrival six-four as an announcement that the music had somehow gone astray tonally and that *it*, the six-four, has intervened to begin the *real*, P-based coda at m. 396. The arrival six-four re-establishes the E tonic by fiat, even if only provisionally at first as a bass tone. The arrival six-four begins the long and harmonically adventurous drive to the first and only PAC of the coda (m. 434), which finally presents the linear descent in E minor that had gone unsupplied by the nonresolving recapitulation (see Example 3–33d). This drive includes aspects of parsimonious voice leading, including the $\boldsymbol{L}^*$ transformation that relates a triad and a dominant-seventh chord and the ic 5–5 transform that relates two dominant-seventh chords whose roots are a tritone apart (described in chapter 2 on pp. 92 and 77–80, respectively). The latter is particularly notable for its suspension of the common-tone C to become the minor ninth of the following dominant chord and also the leap in the bass that foregrounds the tritone relation.

By postponing tonal resolution to the coda, Dvořák is able to highlight the recapitulatory S-zone, calling our attention even more strongly to the importance of G♯ as a local tonic. That is, the deformational strategy of sonata failure in this work invites us to contemplate the logic behind the salient G–G♯ dyadic conflict (between the expositional and recapitulatory S-zones) and the possibility that the outcome of this conflict will end in modal redemption at the end of the symphony.

Conclusion.

Unlike certain commentators, notably Heinrich Schenker and Charles Rosen, who claim that sonata form ossified and became moribund after its codification by nineteenth-century theorists, I would cite the multifarious approaches that Dvořák used for his sonata forms as proof that experimentation, expansion, and expressiveness were as much a part of the formal practice of the nineteenth-century masters as they were for their Classical forebears.[68] The immense corpus of scholarly literature regarding Brahms's treatment of sonata form seems to support this thesis as well. Admittedly, the sonata forms of a Dvořák or Brahms may be more in dialog with the past than with contemporary works (although I will provide evidence in the next chapter that Dvořák's later sonata forms were very much in dialog with Brahms's), but this does not render nineteenth-century sonatas beholden to some sort of pre-set mold, forever doomed to repeat the forms of their Classical antecedents. Indeed, Rosen's example of a nineteenth-century sonata is an odd one, Schumann's Piano Sonata no. 1 in F♯ Minor, op. 11.[69] Written in the early 1830s, hard on the heels of Beethoven's death, by a composer who was self-admittedly conflicted about the viability of the form, Schumann's op. 11, though certainly innovative and worthy of study, is hardly representative of nineteenth-century sonata practice as a whole.

Dvořák's music is particularly useful for illustrating certain areas of interest in the continuing practice of nineteenth-century sonata style. These include, but are not limited to,

---

[68] See Schenker's "The Decline of the Art of Composition: A Technical-Critical Study," translated by William Drabkin, *Music Analysis* 24, no. 1–2 (2005), 33–129 as well as Rosen's *Sonata Forms*. The Classical style was, in many ways, established largely by *Kleinmeister*. The great masters (Mozart, Haydn, and Beethoven) wrote music that was in the style but also transcended it. Similarly, many lesser nineteenth-century composers may have indeed leaned too heavily on the textbook layout of sonata form (as codified by a Reicha or a Czerny), justifying Rosen's claim. Like the Classical masters, however, great Romantic composers such as Brahms and Dvořák were able to continue to expand the expressive possibilities of the sonata style.

[69] Rosen, *Sonata Forms*, esp. 365–92.

those effects along the MC-spectrum (such as the de-energizing transition) that help create a more fluid connection between the exposition's first and second parts; those effects along the EEC/ESC-spectrum that do the same for the end of the sonata proper and the beginning of the coda; the increased importance of parageneric spaces (such as the coda) for the unfolding tonal logic of the form; the use of increasingly "characteristic" motives and harmonies for musical expression (i.e., types of musical content); and, as a kind of corollary to the last category, the incorporation of what would have been perceived by contemporary listeners as nationalistic musical traits into the realm of absolute concert music.

Ultimately, we will be best served by understanding the sonata practice of a great nineteenth-century composer, such as a Dvořák or a Brahms, as being in dialog with an established *sonata style* rather than being composed in a set *sonata form* (or, *qua* Rosen, a family of closely related forms). Not only did these composers have to come to terms with the stylistic norms and transgressions of the Classical era, they had to bring these traits into communion or rapprochement with their own sense of the nineteenth-century aesthetic, an aesthetic that often valued originality over repetition, sublimity over convention, the organic over the mechanical, and (frequently) content over form. In this sense, I hope to have shown at least some of the ways in which Dvořák succeeded at such a rapprochement.

CHAPTER 4. SCHUBERT, BRAHMS, AND DVOŘÁK'S STYLE CHANGE C. 1880

We have already gone over in some detail the significant stylistic shifts that Dvořák's music went through over the course of his career. As described chapter 1, Dvořák's adoption of New German compositional techniques seems to have been triggered by his experiences performing Wagner's works in the 1860s and led to what John Clapham refers to as Dvořák's "Wagner fever"; this lasted until about 1873 or 1874.[1] The following period, the so-called first Slavonic period, lasted until around 1880 or 1881; it was marked by a renewed interest in his Slavonic heritage, and also a turn away from Wagnerism toward Classical models and the music of the early Romantics, such as Schubert. This nationalistic turn may have been inspired by Smetana, who was exemplary for the way that he wrote music that exhibited both Slavic character, Schubertian modulatory effects, and Classical proportion (see the discussion of Smetana in chapter 1, pp. 28–36).

Around 1880 we hear a very obvious change in Dvořák's style, a notable feature of which is the dramatic lessening of Slavonic elements. As Klaus Döge has written, the first Slavonic period was "superseded by a phase in which the music is considerably more subtle and full of detail."[2] Perhaps significantly, this shift took place shortly after Dvořák became personally acquainted with Brahms at the very end of 1878 and lasted until around 1886, after which Dvořák showed renewed interest in Slavonic folk coloring and used the Classical forms less often.[3] Naturally, the stylistic changes around 1880 and their affinity with the music of Brahms

---

[1] John Clapham, *Antonín Dvořák, Musician and Craftsman*, 6. Döge identifies 1873 as the year that this style change took place; see Klaus Döge, "Dvořák, Antonín (Leopold)," 777–814.
[2] Döge, 786.
[3] Döge writes that from about 1886 to 1892 "the previous rigour of the thematic treatment gives way to a more rhapsodic structure; elements of the funeral march, fanfares, pastoral themes, birdcalls in 'Nature' passages, or

could be explained as the result of coincidence or Dvořák's absorption of general style characteristics of the time. Nevertheless, one cannot discount the possibility that the new approach characteristic of Dvořák's post-1880 music may have been inspired by Brahms, perhaps even as a result of a deliberate attempt on Dvořák's part to emulate his slightly older contemporary.[4] Whether these Brahms-like features are a result of Dvořák's personal contact with Brahms or his maturation as a composer, whether they may reflect a deliberate process of compositional modeling or arise simply from Dvořák's absorption of the Brahmsian *Zeitgeist* prevalent in some musical circles, it remains that these features play a role in his post-1880 music to an extent not witnessed earlier. The correlation with Brahms's style has been widely noted, and causation has been blindly assumed.

In the following pages, I will offer additional support for the notion that Dvořák's music of the 1880s reflects Brahms's influence. I will examine the ways in which Dvořák's style changed after 1880 through a close examination of the works written around that time and their intersection with salient details of Dvořák's biography. Such an understanding will help us understand his maturation as a composer during this period and will also help, I hope, settle the questions raised in the preceding paragraph. One might, following the critical arguments of Göran Hermerén and John Platoff, question whether assertions about influence are worth making at all.[5] Their arguments suggest that scholars should circumscribe their use of such assertions because statements of this sort are often posited as facts, rather than as hypotheses that may or

---

themes of special significance…are all prominent in the works of this period." He calls this the second Slavonic period. See Döge, "Dvořák, Antonín (Leopold)," 786.

[4] We have already seen in his imitation of Wagner's style that Dvořák could be very successful at recreating the sound-world of another composer.

[5] Göran Hermerén, *Influence in Art and Literature* (Princeton: Princeton University Press, 1975). Hermerén is almost entirely mute on the question of influence in music in this book, but John Platoff has applied Hermerén's analytic apparatus to musical works in his essay "Writing About Influences: *Idomeneo*, a Case Study," in *Explorations in Music, the Arts, and Ideas: Essays in Honor of Leonard B. Meyer*, edited by Ruth Solie and Eugene Narmour (Hillsale, NY: Pendragon Press, 1989), 43–65.

may not be provable.[6] Despite the problematic nature of influence as a concept, the question of Brahms's influence remains interesting because it provides a lens through which we can view (and perhaps better understand) certain of Dvořák's compositional choices, especially those made during the period in question.

I will argue that Brahms's influence on Dvořák existed and that it was twofold. First, Brahms seems to have directed Dvořák toward a more attentive study of Schubert's formal practices. Second, his own works seem to have provided Dvořák with compositional models. To support these hypotheses, I will make the following arguments:

1) Dvořák was already familiar with Schubert's formal practices before his contact with Brahms. Evidence of this familiarity can be found in his music from before 1878. Dvořák's employment of Schubertian features changed after his encounters with Brahms.

2) Aspects of Brahms's style that are not themselves derived from Schubert appear in Dvořák's music after around 1880. That is, we can separate Brahms's influence from that of Schubert. To a significant degree, we can specify what is meant when it is said that a piece by Dvořák sounds "Brahmsian."

3) Dvořák went beyond the sonata styles of Schubert and Brahms in ways that are not beholden to their influences. This can be seen both before and after his contact with Brahms. This is a reminder that the question of influence, while interesting, is not the only explanation for Dvořák's compositional choices.

[6] Hermerén and Platoff both argue that certain conditions must be satisfied for a hypothesis to be proved or at least convincingly supported. The first condition requires that the influenced artist must have been aware of the prior work of art. Additional conditions require that there must be similarity between the prior work and the influenced work and that there must be an element of change involved. That is, the style of the influenced work must be appreciably different from that of earlier works by the same artist.

I am hardly the first to explore the influence of Brahms on Dvořák; there is general agreement among Dvořák scholars that Brahms's influence became operative sometime around 1877–78.[7] I would, however, qualify this claim with a corollary that the *full measure* of Brahms's influence only becomes audible in Dvořák's chamber and orchestral music during and after 1880. This is the year after which there is a material transformation of the manner in which Dvořák employs his sonata-form resources.[8] By tracing this transformation in greater detail than has been previously attempted, we will gain a new, more nuanced understanding of Dvořák's relationship to Brahms.[9] Since many scholars point to 1876–1881 as the period in which Dvořák forged his fully mature style, a better understanding of the role of Brahms and his music in Dvořák's development will give us a finer appreciation of the works from these years.

Assertion #1. **Dvořák knew Schubert's music before his encounter with Brahms. Evidence of this familiarity can be found in his music before 1878.**

As fellow composers in the Austrian Empire during the waning decades of the nineteenth century, Brahms and Dvořák shared a cultural inheritance in Schubert's music. This inheritance is especially important for the way that it modeled various means through which Romantic content could be worked out over the course of a sonata-form movement.[10] Their exposure to

---

[7] See the discussion of this point in chapter 1, pp. 50–51 where the writings of several scholars are considered.
[8] I will examine several pieces from 1877–81 to support this claim. While Beveridge also points to 1880 as being a pivotal year, he uses only the Sixth Symphony to support his thesis. See Beveridge, 247–87, especially 264–68.
[9] In spite of the space here being devoted to this issue, we should keep in mind that Brahms's influence is most audible in Dvořák's chamber and orchestral works using classical forms. Pieces from other genres in the time frame 1879–81 are constructed according to rather different stylistic criteria; here, Brahms's influence is minimal if it is present at all. Examples include sacred choral music (149th Psalm, op. 52), character pieces (Waltzes, op. 54; Mazurkas, op. 56; *Legends*, op. 59), as well as the opera *Dimitrji*, op. 64.
[10] An important aspect of such modeling includes the differing strategies related to choice of key for, and treatment of, the second group in a sonata-form work.

this inheritance was similar, in that both composers encountered Schubert's music only after a childhood whose musical studies were founded mainly on the music of the Viennese Classicists. Brahms, through his friendship with Robert and Clara Schumann, became familiar with a great deal of Schubert's music in the 1850s; as James Webster has demonstrated, this familiarity was immediately important with regard to Brahms's increased use of a more lyrical formal construction and his adventurous use of keys, especially for second subjects, as instantiated in the chamber works of the early 1860s.[11]

Unlike Brahms, Dvořák did not receive an intensive exposure to Schubert in his teens and twenties, but rather became gradually aware of Schubert's music (especially the *Lieder*) throughout the 1860s. Scholars tend to agree that the bulk of Schubert's influence—as well as Dvořák's renewed interest in both Classical forms and the music of Smetana—became operative during or shortly after 1874–75.[12] Dvořák was already in his early thirties at this point, but Beveridge refers to this period as his "musical adolescence."[13] Given Dvořák's growing familiarity with Schubert's music toward the end of the 1860s and early 1870s, in what ways do Schubertian elements appear in his music before his first meeting with Brahms in late 1878?

It seems that, in some respects, Dvořák responded to elements of Schubert's music that were already present in his own. That is, certain features commonly seen as Schubertian were present in Dvořák's music from the beginning, but they become more salient in works written after about 1874. These features include Dvořák's ease with certain chromatic progressions—for

---

[11] See James Webster, "Schubert's Sonata Form and Brahms's First Maturity," *19th-Century Music* 2, no. 1 (Summer 1978), 18–35, and *19th-Century Music* 3, no. 1 (Summer 1979), 52–71. For a supplementary viewpoint, one that considers Mozart's role as a formative influence on Brahms (in addition to Schubert and Beethoven), see John Daverio, "From 'Concertante Rondo' to 'Lyric Sonata': A Commentary on Brahms's Reception of Mozart," in *Brahms Studies* 1, ed. David Brodbeck (Lincoln, NE: University of Nebraska Press, 1995), 111–36.

[12] See, for example, Jan Smaczny, "The Schubertian Inheritance among Czech Composers," 61–75. Smaczny reports that Schubert's Ninth Symphony was performed in Prague in 1869. He also details Smetana's own devotion to Schubert's music.

[13] Beveridge, esp. 197–206.

example, direct modulations to ♭VI; his tendency to move fluently relative major and minor keys; his proclivity toward modal mixture; and his propensity to write broad, even discursive, melodies.[14] Donald Tovey has commented on the tendency for both Schubert and Dvořák to include developmental passages within their expositions.[15] There is also a reluctance on the part of both composers to leave the tonic key when writing sonata expositions. In Dvořák's earliest works, this is manifested by significant returns to the tonic within the second group, often confirmed by an authentic cadence. Beveridge refers to these tonic insertions as "tonic islands."[16]

In his music written after about 1874, Dvořák seems to have borrowed techniques from Schubert that were not present in his earlier music. One of these is large-scale sequence. Schubert's Piano Trio in E♭ Major has a series of sequences of the main theme lasting fifty-two measures. The entire fifty-two measures are then repeated, transposed up a fifth. Charles Rosen pithily states that, "in short, Schubert arranges sequences sequentially."[17] Beveridge takes special notice of this procedure when trying to locate the onset of Schubert's influence on

---

[14] Klaus Döge specifically mentions Dvořák's modulations around this time as being often reminiscent of Schubert. Döge, "Dvořák, Antonín (Leopold)," 786. Schubert's harmonic adventurousness is most readily heard in the first part of the S-zone, for which he often choose remote keys, such as ♭VI or ♭vi, as in the Sonata in B Major (D. 575) and Piano Trio in E♭ Major, respectively. Other works use different remote keys: the S-zone of the String Quintet begins on ♭III; that of the Piano Sonata in C, D. 840, "Reliquie," begins on vii; and that of the String Quartet in A Minor, D. 784, begins in the dominant *major* (which runs the risk of not being harmonically independent from the opening tonic). Citing Tovey, Webster also notes the abundance of Neapolitan relationships in Schubert's transitions while observing that Schubert never actually begins his S-zones on ♭II. Webster, "Schubert's Sonata Form and Brahms's First Maturity," 23.

[15] In his essay on Schubert in *The Main Stream of Music and Other Essays* (New York: Oxford University Press, 1949; reprint, New York: Meridian Books, 1959), 103–133, Tovey writes that "[t]he part of a sonata known specially as the development is, of course, already at an almost hopeless disadvantage in Schubert because his exposition will have already digressed into developments of its own" (124); and in *Essays in Musical Analysis. Symphonies and other Orchestral Works* (New York: Oxford University Press, 1981), he writes that Dvořák "never grasped the difference between development and exposition at all" (281).

[16] For an account of Schubert's reluctance to leave the tonic, see Webster, "Schubert's Sonata Form and Brahms's First Maturity," 23; for more about Dvořák's use of "tonic islands," see Beveridge, 89–94.

[17] Rosen, *Sonata Forms*, 276. Rosen remarks that Schubert greatly expanded the role of sequence in sonata style, especially in developments (a practice that was then adopted by Bruckner).

Dvořák.[18] For example, large blocks of transposed material, Rosen's "sequences of sequences" in particular, were virtually nonexistent in Dvořák's music before 1875. Beveridge claims that Dvořák was very interested in Schubert's piano trios around this time and cites several strong concordances between Schubert's Piano Trio in B♭ Major and Dvořák's Piano Quartet in D Major.[19] In terms of recapitulation, Rosen points out that Schubert, especially in his early works, will make use of the "degenerate recapitulation," in which the opening theme is stated so that the recapitulation merely reproduces the exposition a perfect fifth lower.[20] While Dvořák would never make use of this formal strategy, he would borrow other recapitulatory strategies from Schubert. For example, the development section of the finale of Schubert's Piano Trio in E♭ Major, D. 929, contains a quotation of a theme from the slow movement. Dvořák would use this cyclical feature in early pieces such as the finales of his own Piano Trio in B♭ Major, op. 21, and Serenade for Strings, op. 22 (both from 1875).

***Assertion #2*. Dvořák's employment of Schubertian features changed after his first personal encounters with Brahms.**

To corroborate this assertion, we first need to review the timeline of Dvořák's familiarity with Brahms and his music. Although Dvořák most likely became familiar with Brahms's name (though perhaps not his music) in the mid-1870s, it was not until 1877 that Eduard Hanslick

[18] Beveridge, 219–25.

[19] Ibid., 227–31. The second group of the exposition of Dvořák's own Piano Trio in B♭ Major (1875) begins in the Classically orthodox dominant.

[20] Rosen, 153, 288, 360. He notes that Hummel also made use of this procedure. Hepokoski and Darcy reject the term "recapitulation" in these cases, classifying such works as Type 2 sonatas; see Hepokoski and Darcy, 353–87.

wrote to tell Dvořák of Brahms's interest in his work.[21] It might seem obvious, then, that Dvořák's String Quartet in D Minor, op. 34 (1877), which he dedicated to Brahms in early 1878, would bear the stamp of the older composer and be a suitable point to locate the beginning of Brahmsian influence. Any Brahmsian elements, however, may have been added later, as Dvořák apparently emended much of the quartet according to Brahms's suggestions.[22] Otherwise, Beveridge finds nothing convincing about Gerald Abraham's claims of Brahms's influence in the piece.[23] Clapham has very little to say about the issue beyond the work's dedication to Brahms, while noting that the first movement is "slightly Schubertian"; Hartmut Schick finds pervasive modeling along Schubertian lines.[24] There is very little about the String Quartet in D Minor that is radical or tonally surprising—the second group is in F major (III) in the exposition and the tonic major in the recapitulation (this pattern is very common in Beethoven's minor-key sonata forms). Dvořák's use of hemolia in his early works is most likely not derivative of Brahms, either, since it is a rhythmic characteristic of that quintessentially Czech dance, the *furiant*.

---

[21] The year 1874 was the first of several in which Dvořák won the Austrian State Stipend. Eduard Hanslick was on the jury that year and was joined by Brahms in 1875 for the following years. This stipend was awarded to artists who were talented, young, and poor. See Clapham, *Dvořák*, 35ff, especially the quotation of minister Karl Stremayer's report that the fifteen pieces of Dvořák's first submission "display an undoubted talent, but in a way which as yet remains formless and unbridled…" Cf. also Klaus Döge, *Antonín Dvořák. Leben-Werke-Dokumente* (Mainz: Schott, 1991), 331, for a comprehensive documentation of the five times that Dvořák won the stipend (1874–78).

[22] Dvořák edited the quartet in 1879 after his first two meetings with Brahms. In a letter to Brahms dated October 15, 1879 Dvořák wrote: "I saw myself all the more called upon to alter much in the D-minor quartet in particular, since you were so kind as to accept from me the dedication of the work; and so it was thus my sacred duty to offer to such a famous master a work that should satisfy if not all then at least (pardon my immodesty) many of the main demands that one can place on a work of art." See Beveridge's quote in Beckerman, *Dvořák and His World* (Princeton: Princeton University Press, 1993), 69–70

[23] Beveridge, *Romantic Ideas in a Classical Frame*, 250

[24] Clapham, 170. In line with Clapham's hunch that Schubert is a more salient influence than Brahms, Schick has written that Schubert's String Quartet in A Minor, D. 804, influenced the opening of Dvořák's op. 34. Further, he shows that the opening of the second group of the Dvořák's quartet roughly corresponds to the second violin part in Schubert's second group. Indeed, Schick sees a large-scale formal resemblance between the two first movements, going so far as to call Dvořák's effort a "homophone" of Schubert's (192).

Rather, Dvořák's use of hemiola is more reminiscent of the opening movement of Beethoven's Symphony no. 3, "Eroica," or the opening measures of Schumann's Symphony no. 3, "Rhenish."

Although the Quartet in D Minor may not have a formal antecedent in Brahms's music, it is conceivable that the idea of dedicating a piece to a master of Classical form inspired Dvořák to tighten up his own formal procedures without recourse to direct modeling. In other words, the quartet is less influenced by Brahms's music itself than by Dvořák's conception of Brahms's artistic ideology. Given that Dvořák's early sonata forms were often formally and tonally diffuse, we might understand the formal orthodoxy of the op. 34 quartet as originating in Dvořák's intention to offer it to Brahms.

In March 1878, Dvořák wrote to Simrock with the intent to acquire Brahms's Hungarian Dances, partly to serve as a model for his own Slavonic Dances (themselves commissioned by Simrock). From this we can see that even before their first personal meeting, Dvořák had become aware of Brahms's music. Although we do not know which works Dvořák received from Simrock that first time, Dvořák continued to receive scores of Brahms's works for the rest of his career. Since the dedication of the Quartet in D Minor and the request for scores both happened in 1878, it would be easy to ascribe the onset of Brahmsian influence to that year. While Dvořák's awareness of and interest in Brahms's music are clear at that time, his understanding of Brahms's compositional techniques—at least as these techniques are reflected in his own sonata-form works—was not yet complete.

I would contend that the most important event in the Brahms-Dvořák relationship—the one with the greatest musical consequences for Dvořák—occurred in December 1878 when the two composers finally met in person (and then again in January 1879). We know from Dvořák's letters that during the latter of these two meetings, especially, they discussed some of the

compositional issues that Brahms had raised in an earlier, undated letter.[25] They met three more times during 1879–80.[26] It is possible that during these later meetings, Brahms may have directed Dvořák's attention to certain of Schubert's modulatory and formal strategies. More than one author has speculated that it was specifically the Beethovenian and Schubertian elements in Brahms's music to which Dvořák was most strongly attracted, having cultivated both influences for some years already.[27]

We must still answer the question of how Dvořák's employment of Schubertian elements changed after his meetings with Brahms. One of the most important examples is the String Quartet in C Major, op. 61, written in 1881. Although Dvořák had employed three-key expositions in earlier works, none had so closely followed the Schubertian model; indeed, Dvořák was more prone to begin the S-zone of earlier works in the dominant only to abandon it than to begin, as Schubert habitually does, in a remote key while ultimately closing in the dominant.[28] The S-zone of the C-major quartet, on the other hand, is very similar to that of Schubert's String Quintet in C Major, D. 956. Both begin in E♭ major (♭III) and close in G major (V). Dvořák seems to have modeled his opening strategy after Schubert's as well. Both pieces place a salient chromatic chord in their third measure—in Schubert's case a common-tone

---

[25] See Beckerman, *Dvořák and His World*, 69–70, where Beveridge quotes Dvořák writing to Brahms: "During your last stay in Prague [January 1879] you were so kind as to draw my attention to some things in my works, and I must only be very thankful to you for it, for now I have really seen the many bad notes and have substituted others for them." My full quotation of Brahms's letter may be found in chapter 1, p. 53.

[26] Beckerman, *Dvořák and His World*, 70.

[27] See, for example, Gerald Abraham's remark that "Dvořák was influenced less by Beethoven than by the Beethovenian element in Schubert….In the same way he was especially influenced by the Schubertian element in Brahms." Abraham, "Dvořák's Musical Personality," in *Antonín Dvořák, His Achievement*, ed. Viktor Fischl (London: Drummond, 1943; reprint Westport, CT: Greenwood Press, 1970), 210. I disagree with Abraham only in that Beethoven's influence was evident from the very beginning of Dvořák's career.

[28] For example, the exposition of the Piano Quartet in D Major, op. 23, has the key scheme I–V–VI and lacks an EEC. In Hepokoski and Darcy's terms, this is a failed exposition. The exposition of the Piano Trio in B♭ Major, op. 21, is in dialog with the three-key expositional type, since its S-theme is presented in full first in V and then in II (V/V), although it ultimately cadences in V.

diminished-seventh chord, in Dvořák's a common-tone half-diminished seventh (see Example 1–16 and the surrounding discussion on pp. 54–56).

Given that certain Schubertian elements, but not his characteristic three-key expositional strategy, were common in Dvořák's music up to this point, what was the impetus that inspired Dvořák to adopt this close replication of Schubert's three-key practice? Certainly we could argue that, as in 1875 when Dvořák adopted the Schubertian practice of transposing large blocks of material, he was simply experimenting with certain aspects of Schubert's style. Since Dvořák abandoned this technique in his later work, however, it suggests that he had taken what he wanted of Schubert's style during his stylistic shift of 1874–75 and rejected those aspects in which he was less interested. Thus, it seems reasonable to hypothesize that his conversations with Brahms could explain his new interest in Schubertian formal schemes. In addition to Schubert, Brahms may have drawn Dvořák's attention to a more detailed appraisal of Schumann's work, although the available musical and biographical evidence for this is much less persuasive than it is for Schubert.[29]

***Assertion #3*. Aspects of Brahms's style that are not themselves derived from Schubert appear in Dvořák's music after around 1880.**

Dvořák's sonata style around 1880 grew formally tighter, with more logically constructed formal and harmonic structures replacing the more discursive, indulgent, or seemingly spontaneous harmonic structures that seem to pervade some of his earlier works. To substantiate

[29] Although Clapham finds Schumannesque passages in Dvořák's String Quintet in G Major, op. 77 (1875) and the String Quartet in E Major, op. 80 (1876), it is not until the Piano Quintet in A Major, op. 81 (1885) that, according to Beveridge, a pervasive modeling occurs; see Beveridge, "Dvořák's Piano Quintet, op. 81: the Schumann Connection," *Chamber Music Quarterly* (Spring 1984), 2–10.

this claim, one need only look at the expositions in the sonata-form movements of earlier works such as the Fourth and Fifth Symphonies, the String Sextet, or the String Quartets in E Major and D Minor, and compare them to the Violin Sonata, the String Quartet in C Major, or the Sixth and Seventh Symphonies. In general, the later works contain a higher concentration of techniques that are typically associated with Brahms but not with Schubert: linkage technique (Schenker's *Knüpftechnik*); the use of salient motives at multiple structural levels; dense piano writing; the use of omnibus progressions immediately preceding climaxes; chains of thirds; and the sophisticated use of metric dissonances. It is not that these features are never found in Dvořák's earlier works, but their frequency increases dramatically in the period from 1880 to 1886.

In order to test the hypothesis that Brahms's influence becomes most important in Dvořák's music after 1879, we can examine the sonata-form movements from late 1878 through 1880 to see if they exhibit Brahmsian characteristics not found in earlier works. It is striking, and perhaps not coincidental, that most of the music Dvořák was writing in 1878–80 did not utilize sonata form.[30] Schick sees the immediate drop-off in the number of sonata-form works in this period as directly related to the beginning of Dvořák's relationship with Brahms; the implication would seem to be that Dvořák experienced some sort of "anxiety of influence."[31]

---

[30] This three-year span includes: nationalistic works such as the Czech Suite, op. 39, the three Slavonic Rhapsodies, op. 45, and the first set of Slavonic Dances, op. 46; vocal works, including several song settings and his opera *Vanda*; and many short character pieces such as the *Mazurek*, op. 49 and the two Waltzes, op. 54. See Döge, *Antonín Dvořák. Leben-Werke-Dokumente*, 174, where he points out that Dvořák may have heard Brahms's *Haydn Variations* performed in Prague in April 1877 before composing his own Symphonic Variations, op. 78 in August–September of that year. Other than a fugal finale (already familiar from Beethoven's variation sets), there is little similarity in the manner in which both composers vary their initial thematic material.

[31] Schick, *Studien zu Dvořáks Streichquartetten*, 209. We cannot know if Dvořák actually felt anxious about Brahms's influence, since his letters are silent on this issue. It may have been an unconscious process by which Dvořák, through his conversations with Brahms and score study, put his sonata-form composition on hold while digesting new information about certain sonata-related procedures. Schick also hypothesizes that Dvořák took a break from writing sonata-form pieces because he began to understand the great commercial value of Slavic character pieces. After all, Brahms recommended the Moravian duets to Simrock and *not* the F-major symphony or E-major string quartet, both of which he saw as a jury member. The Slavonic dances commissioned by Simrock were virtually an overnight, and international, success.

Indeed, after writing nine sonata-form movements in 1875 and seven in 1876, the only works containing significant sonata-form movements from 1878 to 1880 are the Sextet, op. 48 (May 1878); the String Quartet in E♭ Major, op. 51 (December 1878–March 1879); Violin Sonata, op. 57 (1880); and the Sixth Symphony, op. 60 (1880).[32] The latter two works are widely considered Brahmsian while the first two, commonly acknowledged as nationalistic works, are not. Especially for the Sextet, and perhaps less so for the op. 51 quartet, it is likely that Dvořák already had a clear conception of their melodic content and formal outlines before his important contact with Brahms and Simrock.[33]

We know that Dvořák made many revisions to the String Sextet and the Violin Concerto despite the rapid time of composition for the former (May 14–27, 1878).[34] This was a departure from Dvořák's compositional procedure to date, a procedure that had usually been quite facile and unconcerned with major corrections. The knowledge that these pieces were being performed by the great artists of the era probably accounts for a greater sense of self-criticism.[35] Dvořák found himself embraced by Hanslick, Brahms, and Joachim, a trio of conservatives who helped shape his international career and encouraged him to tighten up his formal practices.[36] The Sextet and the Quartet in E♭ Major nevertheless possess many nationalistic traits, the novelty of

---

[32] The first movement of the Violin Concerto, op. 53 (1879), has ritornello elements in its sonata structure, as one might expect (Hepokoski and Darcy's Type 5 sonata). I choose not to analyze it here since it is extremely deformational with respect to sonata form: its truncated recapitulation leads without pause into the second movement.

[33] Beveridge actually sees some formal regression in the sextet and the op. 51 quartet. "Continuity without clear articulation had been a trademark of his amorphous semi-Wagnerian works from earlier years, and the sonata forms of 1878–9 make a partial retreat in the direction of that style." Beveridge, *Romantic Ideas in a Classical Frame*, 263.

[34] Beveridge, 258.

[35] In addition to his contacts with Brahms and Hanslick, Dvořák made the personal acquaintance of Joachim in July 1879, when the violinist held a private concert in his Berlin home of Dvořák's String Quartet in E♭ Major and String Sextet (Clapham, *Dvořák*, 47). Dvořák also became friendly with the prominent conductor Hans Richter around this time.

[36] Indeed, we know that Joachim suggested many amendments to the Violin Concerto. Dvořák heeded many of these suggestions, but not all. Both Joachim and Simrock's representative were displeased that Dvořák chose to retain the truncated recapitulation of the first movement in spite of their advice against it. Clapham, *Dvořák*, 49.

which probably accounted for much of their immediate success.[37] Little exists in them of the Brahmsian stamp that would become so audible only a year later in the Violin Sonata and Sixth Symphony.

String Sextet in A Major, op. 48

Composed in its entirety before Dvořák's first meeting with Brahms, the fluid and lyrical construction of the Sextet's first movement strongly evokes Schubert. Specifically, the music seems reluctant to leave the tonic; the deceptive presence of transitional rhetoric early on divides the P-zone into a quasi-ABA structure (something often found in Schubert's primary groups). The transition-like material of the P-zone's B section at m. 23ff. (not actually TR itself) forecasts the motivic material of the S-zone; the return of P-based material in C♯ major at m. 28 anticipates the tonality of the S-zone. Clapham considers these anticipations unfortunate.[38] On the contrary, the derivation of the second group from the developmental processes of the first group is evidence of Dvořák's growing mastery of thematic economy at this point in his career.

Dvořák's sextet resembles Schubert much more than Brahms, despite the similarity of its opening texture to that of Brahms's String Sextet in B♭ Major, op. 18. The first movement of Dvořák's sextet has a two-key exposition (A–c♯/C♯), as opposed to the three-key exposition of the first movement of Brahms's op. 18 (B♭–A–F). Overall, Dvořák's compositional means in the sextet are quite distinct from those of Brahms, especially with respect to the incorporation of nationalistic elements. For example, the second movement of Dvořák's sextet is titled *Dumka*,

[37] To this end, Clapham states that it is in these two works "that national features make a really significant impression in his chamber music for the first time." Clapham, *Dvořák*, 46.
[38] Clapham, *Antonín Dvořák, Musician and Craftsman*, 172.

and the opening measures contain several of the features discussed in chapter 1 as nationalistic: piquant harmonies through voice-leading, falling away from the leading tone at cadences, and five-measure phrase lengths. The third movement is a vivacious *furiant* (though it lacks the hemiolas typical of this dance). We have to look later in Dvořák's oeuvre to find a piece that demonstrates his absorption of Brahms's compositional technique.

String Quartet in E♭ Major, op. 51

The String Quartet in E♭ Major, op. 51, was commissioned by Jean Becker of the well-known Florentine Quartet sometime in late 1878; he specifically requested that Dvořák create a quartet of Slavonic character. The impetus for the composition thus preceded Dvořák's initial personal contact with Brahms, although its composition was begun after their first meeting and completed after their second.[39] So, unlike the sextet, which was composed entirely before Dvořák's meetings with Brahms, we are now presented with a conundrum: how might Dvořák have reconciled a commission for a nationalistic work with the newfound formal insights that he may have just gleaned from Brahms?

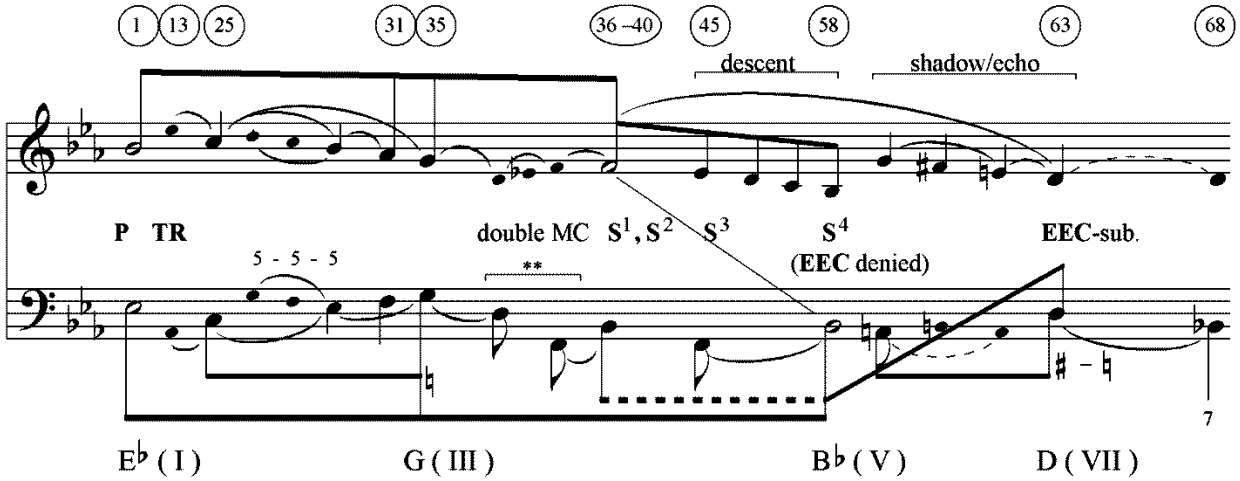
The answer lies at the level of middleground organization, a level where a subtle homage could be made. That is, at the surface the op. 51 quartet does not sound as if it were influenced by Brahms, but there is a new coherence of large-scale organization that was not typical of Dvořák's earlier works. The nature of Becker's commission placed limits on the extent to which

[39] Clapham (173) tells us that Dvořák began the quartet on Christmas Day 1878, but then put it aside to finish other projects before resuming and completing it in March 1879.

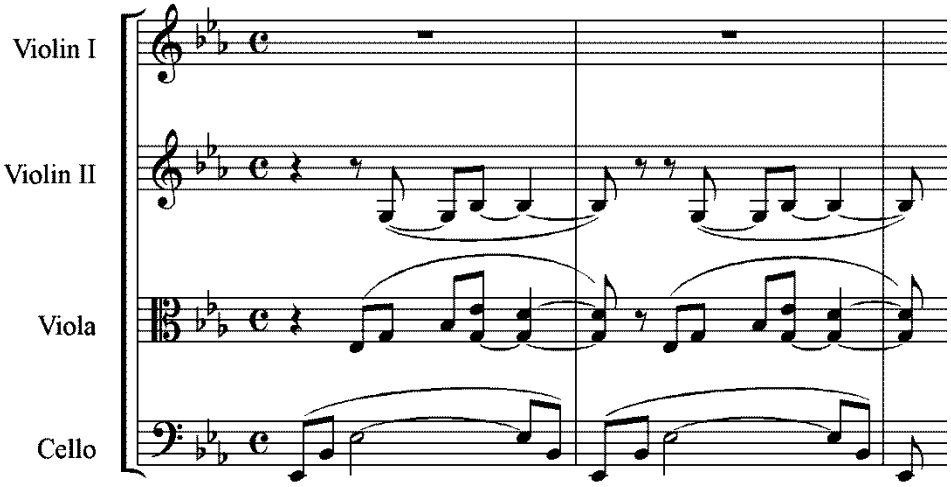
Dvořák could have mimicked Brahmsian (read: German) traits without betraying Becker's wishes, even had Dvořák wished to pay homage to Brahms in the work.

Example 4–1. Demonstrates the relation of the opening motive to the order of keys in the exposition.

a. String Quartet in E♭ Major, op. 51, deep middleground of the exposition.



b. Opening E♭ major-seventh chord in mm. 1–2.



Large-scale coherence in the op. 51 quartet is demonstrated through the harmonies that articulate the medial caesura, the initial key of the S-zone, and the point of expositional closure. As we saw in the last chapter**,** these structural joins are problematic from the perspective of Hepokoski and Darcy's Sonata Theory (see pp. 205–208).[40] D major (VII), despite its role in securing a cadence (marked as "EEC-substitute" in Example 4–1a), can be understood as an unfolding of the dominant's upper third. In more poetic terms, the termination of the S-zone is subverted by a shadow key, a deep middleground echo of the expected tonal goal of B♭ major. The pattern of keys in the expositional *Anlage*, E–G–B♭–D, beamed in Example 4–1a (bass), can be heard as a large-scale composing-out of the first measures of this quartet, where a salient "nationalistic" harmony (a major-seventh chord) is created when D is added to the opening E♭ triad (see Example 4–1b).[41] Thus there is an internal logic to the unconventional key structure of the exposition; Beveridge is not quite right when he claims there is no tonal unity in the second group.[42]

The manner in which Dvořák highlights the keys of the expositional *Anlage* is extraordinary and perhaps unique in his output. We have already explained the unusual choice of D major for the EEC-substitute. This choice is foreshadowed by the MC that terminates the transition; that is, TR seems to follow the Schubertian strategy of using a salient dominant preparation of the "wrong" key (i.e., not B♭ major, the key in which S begins). Here, though, the emphatic, *forte* MC on a G major chord (V/vi) in m. 35 is immediately undercut by a sequential

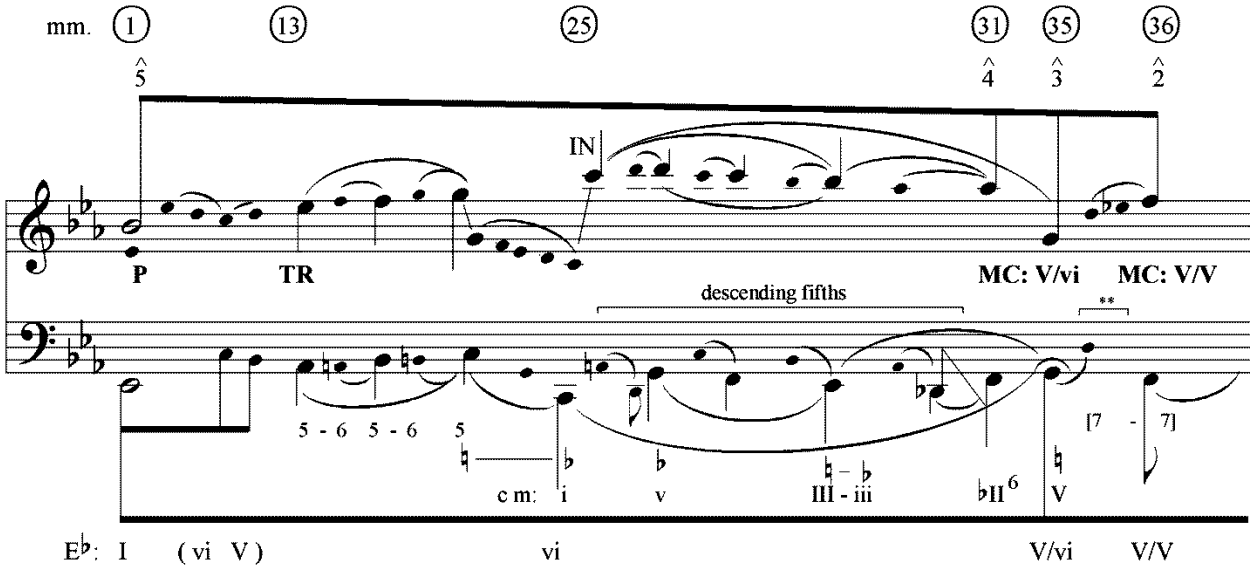
[40] For example, at m. 58 a potential EEC is undermined by its weak metric placement and by the continuation of the same figuration over the join. At m. 63 the cadence is not in the original key of the S-zone.

[41] We might consider this an example of "associative harmony" as discussed by Milton Babbitt in *Milton Babbitt: Words About Music*, edited by Stephen Dembski and Joseph Straus (Madison: University of Wisconsin Press, 1987), 139 and esp. 148–50.

[42] He remarks that the second group begins in B♭ but then "drift[s] away never to return." Beveridge, 261.

repetition in the next measure (see Example 4–2a). This creates a double MC-effect, but one of a peculiar kind. The second MC-candidate (m. 36) is a kind of shadow or echo of the first even though it prepares B♭, the normative key of V. It functions more like an anacrusis to the S-zone than an event in its own right, because unlike the first MC-candidate (m. 35) it is not preceded by a dominant-lock. This double MC strategy—very different from the two MCs of Hepokoski and Darcy's "trimodular block" (TMB)—is wholly original to Dvořák; it is found neither in Brahms nor in Schubert. [43]

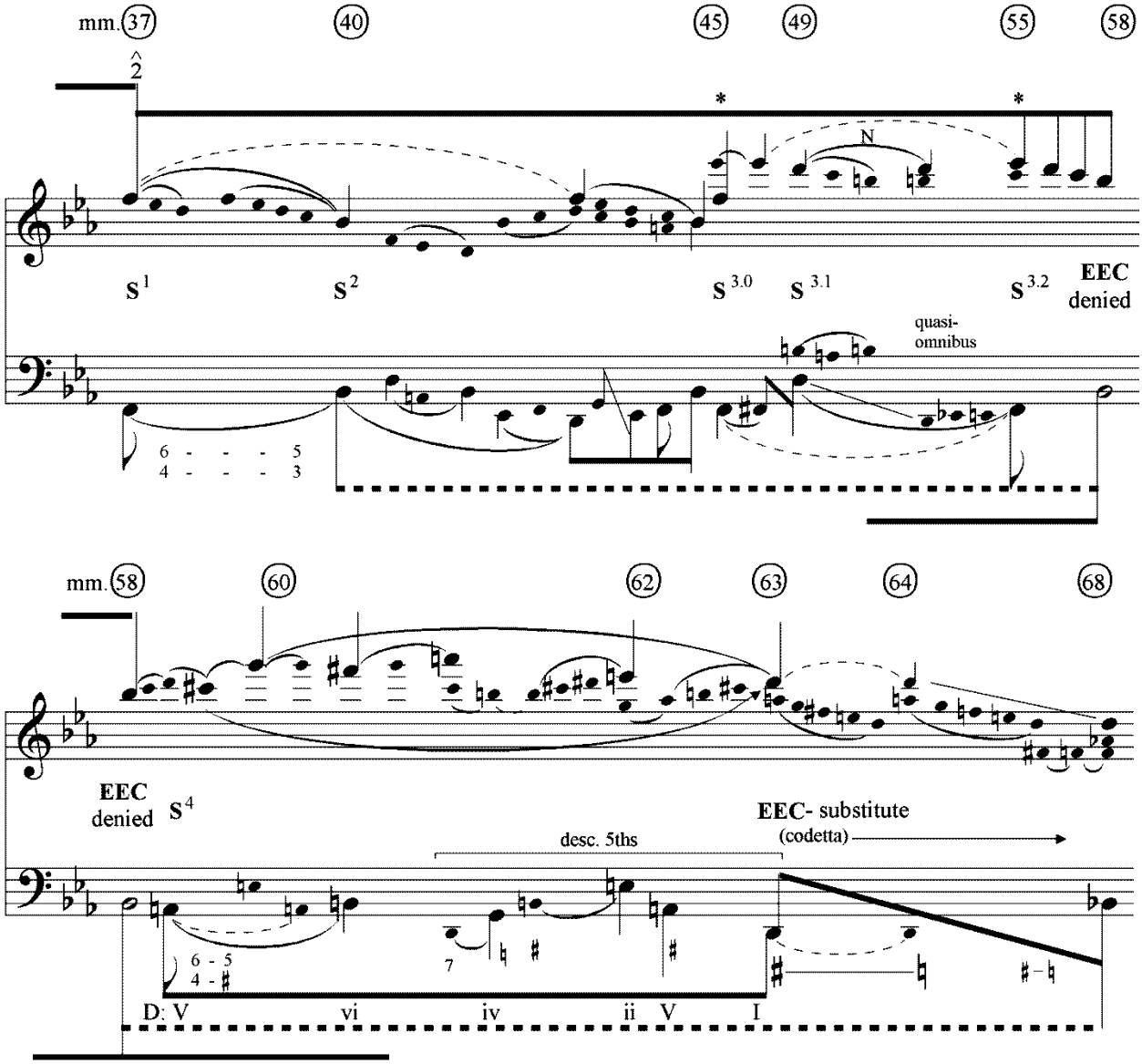
Example 4–2. String Quartet in E♭ Major, op. 51, i, mm. 1–36, P to MC.



[43] In a trimodular block, the music between the two MC-candidates comprises two complete modules, TM^1 and TM^2; the first of these is a prospective but somehow flawed S-theme, the second a revival of TR-rhetoric, usually including a dominant-lock. It is clear that the one measure separating the two MC-candidates in Dvořák's op. 51 has nothing in common with this scheme.

The S-zone then articulates two keys, B♭ major and D major. This does not follow the Schubertian model because it does not close in the dominant; if anything it reverses Schubert's usual procedure, because instead of leading to the dominant from a distant key it begins there and moves away. A Schenkerian account of the S-zone, however, yields only one structural key: the dominant (see Example 4–3). D major is an unfolding of the upper third of V.

Example 4–3. String Quartet in E♭ Major, op. 51, i, detail of the S-zone, mm. 37–68.



While an underlying internal logic is often difficult to find in Dvořák's earliest works (where discursive harmony often seems merely discursive for its own sake), here associative harmony—the reference of the middleground bass line to the opening motive—reinforces the structural logic. The working out of a "tonal problem" is often cited as being typical of Brahms (also Beethoven). While Dvořák did not pay overt homage to Brahms in the String Quartet in E♭ Major—the quartet sounds little like Brahms—he may have honored Brahms in a subtler way that displays reverence toward their common musical ancestor (Schubert) and also a keen awareness of the structural implications of an unusual opening harmony.[44]

Violin Sonata in F Major, op. 57

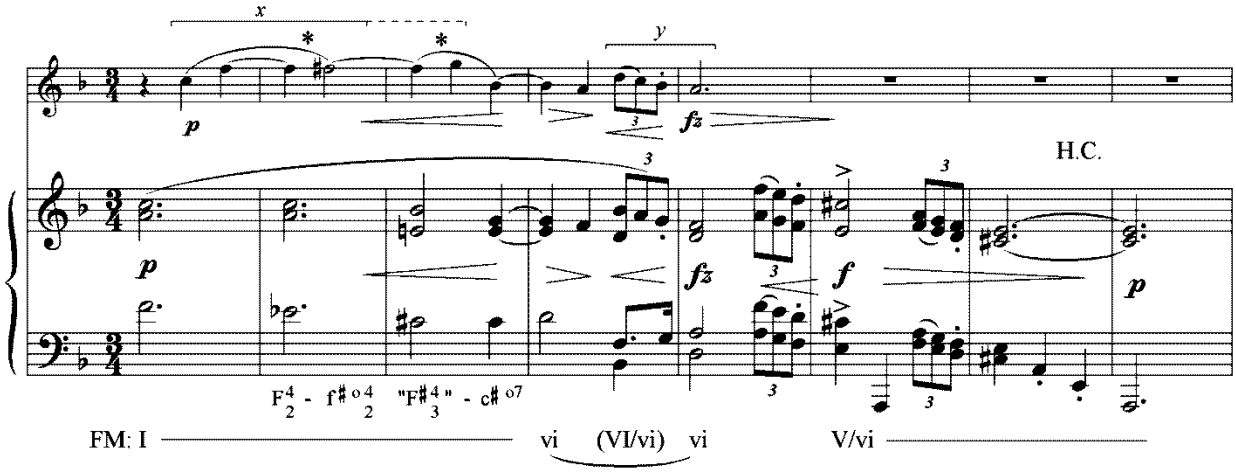
Dvořák's very next sonata-form piece was not composed as the result of a commission and directly followed one of his meetings with Brahms. Brahms spent some time with Dvořák during his visit to Prague in early February 1880 when, with Joachim, he performed his own recently completed Violin Sonata in G Major, op. 78 (published November 1879).[45] Dvořák was quite excited by this performance, and it is probably no coincidence that very shortly after hearing it he began work on his own Violin Sonata in F Major, op. 57 (begun and completed in March 1880). Unlike the op. 48 sextet and the op. 51 quartet, the melodic-harmonic content of the Violin Sonata is strongly reminiscent of Brahms (though not necessarily of op. 78), as is the economical working-out of the themes. Not limited by the nature of a commission or a specific request from a publisher, it is as if Dvořák were finally able to express in music the issues that he

[44] This calls to mind the structural implications of the first-inversion B♭ major chord with which Brahms begins his Piano Concerto no. 1 in D Minor, op. 15). See Joseph Dubiel, "Contradictory Criteria in a Work by Brahms," in *Brahms Studies 1*, ed. David Brodbeck (Lincoln, NE: University of Nebraska Press, 1995), 81–110.
[45] Döge, *Antonín Dvořák. Leben-Werke-Dokumente*, 174.

and Brahms had discussed during their prior meetings. In the process, he would prove himself capable of composing a piece as rich and artistically satisfying as his Viennese friend's music. Clapham, while providing few examples, finds the guiding thumbprint of Brahms both in the rhythmic treatment of themes in the first movement and in Dvořák's proficiency in the piano writing, which Clapham claims to be Dvořák's "first success in writing satisfactorily for the piano in a chamber work…."[46] To be sure, the parallel sixths doubled at the octave in mm. 5–6 (followed by parallel thirds in mm. 6–7), shown in Example 4–4a, sound like Brahms.[47] Further elaboration of Clapham's points requires us to examine the melodic-harmonic content of these first few measures in more detail.

Example 4–4. From the first movement of the Violin Sonata, op. 57.

a. Opening motives, mm. 1–8.

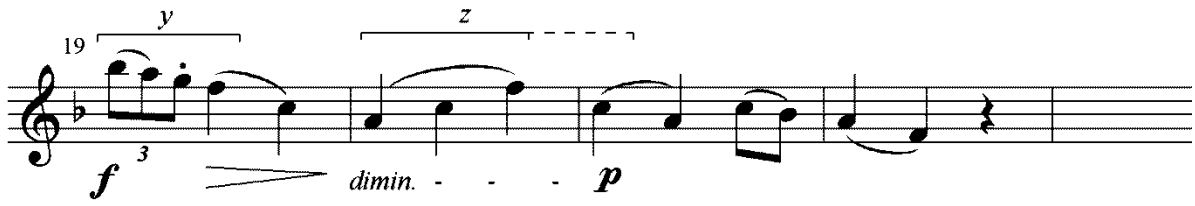


[46] Clapham, *Antonín Dvořák, Musician and Craftsman*, 194. Clapham argues that Dvořák reached a satisfactory style of writing for solo piano slightly earlier, in the *Theme and Variations*, op. 36 (1876). I will focus only on the first movement of the Violin Sonata, since I believe that the majority of the Brahmsian elements are there, but this is not to discount the learned (read "Germanic") aspect of the fugato in the finale.

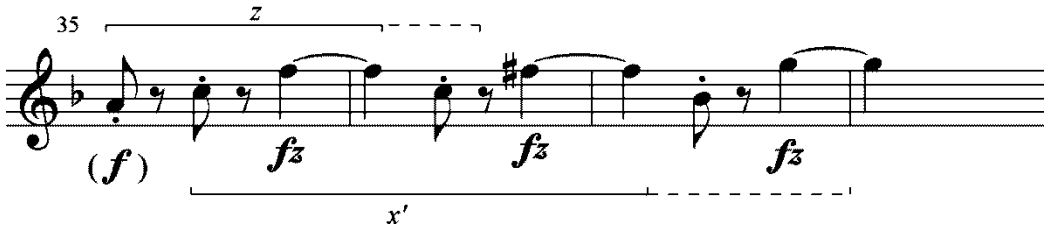
[47] Compare with mm. 13–20 in the first movement of Brahms's Piano Quartet in G Minor, op. 25. Also compare the opening phrases of the two works (mm. 1–4 of the Brahms, mm. 1–8 of the Dvořák): both end with a half cadence that introduces the heretofore absent deep-bass register of the piano (A1 in both cases). For a further connection between these two movements, see note 49.

Example 4–4. continued.

b. The beginning of the transition (TR^1).



c. The continuation of the transition (TR^2).

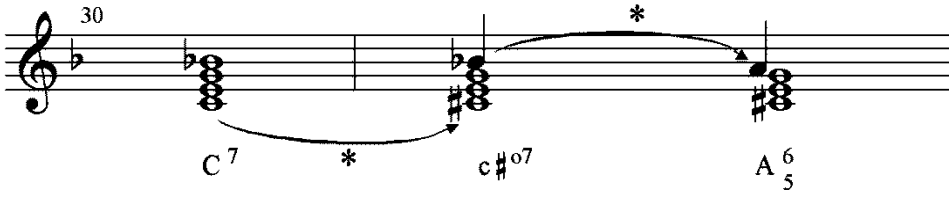


Already in the first measures we hear the important ascending semitones F–F♯–G and their descending counterpart, B♭–A. In the first case, the movement from F♮ to F♯ in the second measure changes a dominant-seventh chord to a diminished-seventh chord. A similar process occurs in the next measure (these changes are indicated by asterisks in Example 4–4a). This semitonal shift from dominant-seventh to diminished-seventh becomes an essential ingredient in the developmental process of the transition (see Example 4–5a), especially as it allows Dvořák to pass smoothly and quickly from the dominant of F to the dominant of D, omnibus-related dominant-seventh chords. The developmental portion of the S-zone in the exposition also makes

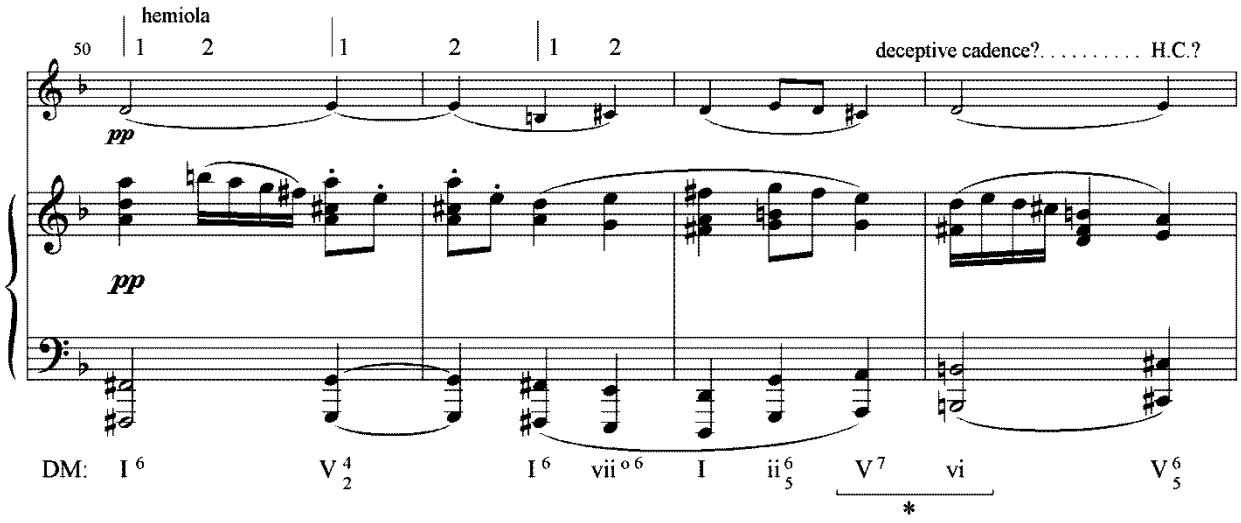
use of this technique (see mm. 83ff.). Ascending implications of F♯ are neutralized in the coda, where it is enharmonically respelled as G♭ (m. 297) and resolves down to the tonic.[48]

Example 4–5.

a. Semitonal shifts between dominant- and diminished-seventh chords.



b. Violin Sonata, op. 57, i, The beginning of the second group (S^1). The hemiola of the end of TR persists into S.



[48] This kind of fascination with Neapolitan relationships, sometimes referred to as the Neapolitan complex, is characteristic of much of Brahms's music. Cf. Peter H. Smith, "Brahms and the Neapolitan Complex: ♭II, ♭VI, and Their Multiple Functions in the First Movement of the F-minor Clarinet Sonata," in *Brahms Studies* 2, ed. David Brodbeck (Lincoln NE: University of Nebraska Press, 1998), 169–208; and Christopher Wintle, "The 'Sceptered Pall': Brahms's Progressive Harmony," in *Brahms 2,* ed. Michael Musgrave (Cambridge: Cambridge University Press, 1987), 197–222.

The Violin Sonata is not Dvořák's first piece to exploit a head motive's essential semitone for developmental procedures, but the sonata takes such exploitation to a level rarely seen in earlier works. Given the vigor and ubiquity with which the semitone is treated, we might be justified in calling it a Brahmsian element, because the large-scale realization of a salient motivic semitone is a hallmark of Brahms's style.[49]

Also noteworthy is the ingenious yet economical treatment of the head motive for the generation of TR material. Although the beginning of TR is P-based, it reverses the order of elements from *x*–*y* to *y*–*x′* while freely interpolating triadic material (*z*) suggested in the ascending fourth of motive *x*; see Example 4–4b and 4–4c. The triadic element (*z*) then introduces an expanded form of the head motive (*x′*) in TR^2. This kind of linking technique (*Knüpftechnik*) was described by Schenker as the closing element of one phrase becoming the opening of the next; such linkage is a vital part of the concept of developing variation first described by Schoenberg in his writings on Brahms.[50] Again, though Dvořák uses developing variation quite often in his earlier works (even as early as op. 1), the manner in which he deploys it in the Violin Sonata, so soon after his crucial first encounters with Brahms, strikes me as especially evocative of a Brahmsian compositional ideal.[51]

---

[49] Arnold Schoenberg draws our attention to this element in his essay "Brahms the Progressive," where he discusses Beethoven's String Quartet in F Minor, op. 95. Schoenberg, *Style and Idea: Selected Writings of Arnold Schoenberg*, ed. Leonard Stein with translations by Leo Black (Berkeley: University of California Press, 1984), 423–24. Walter Frisch continues the discussion by analyzing, according to Schoenberg's principles, Brahms's Piano Quartet in G Minor, op. 25, especially as it relates to the descending semitone. Walter Frisch, *Brahms and the Principle of Developing Variation* (Berkeley: University of California Press, 1984), esp. 66–70. Indeed, the play of significant ascending and descending semitones links the opening phrases of Dvořák's Violin Sonata and Brahms's op. 25. In both works, semitones and fourths (also rising or falling) form the intervallic building blocks of the P-theme. See also Peter H. Smith, *Expressive Forms in Brahms's Instrumental Music: Structure and Meaning in His Werther Quartet* (Bloomington, IN: Indiana University Press, 2005), esp. 73–85, regarding semitonal relationships in Brahms's Piano Quartet in C Minor, op. 60.

[50] Schenker specifically associates *Knüpftechnik* with Brahms's style. Schenker, *Harmony*, ed. Oswald Jonas, trans. Elisabeth Mann Borgese (Chicago: University of Chicago Press, 1954), 11–12. Cf. Peter H. Smith, "New Perspectives on Brahms's Linkage Technique," *Intégral* 21 (2007), 109–154.

[51] Beveridge, 42–61, presents a close reading of Dvořák's op. 1 and its use of developing variation.

The S-zone of op. 57 is in the key of D major (VI♯), which is more like Dvořák's own Symphony no. 5 in F Major (1875), whose S-zone is also in D major, than like Brahms's Violin Sonata in G Major, op. 78, which presents its S-zone in the dominant (which happens also to be D major). Indeed, as I stated above, there is little that is formally reminiscent between the two violin sonatas. Although Brahms and Dvořák are both quite discursive in the second halves of their respective expositions, the manner in which they are discursive is totally different. Brahms brings his exposition to a convincing close in D major, then uses a common-tone shift to begin the C-zone in B major.[52] In contrast, Dvořák flirts with the key of the overall tonic in the S-zone by dwelling on its dominant (much as in the first movement of his Fifth Symphony) and then ends the exposition by standing on the dominant of D major; that is, there is no EEC. Thus, while we are concerned in this chapter with the influence of Brahms, we must not lose sight of the fact that Dvořák often borrowed from himself for formal antecedents.

Two additional Brahmsian traits are audible in Dvořák's Violin Sonata and may be related to techniques that Brahms used in his recently completed Symphony no. 1, op. 68 (1876). The first involves the freely imitative developmental portion of Dvořák's S-zone, mm. 87–97, which is based on falling thirds (or rising sixths) harmonized in tenths. Third-chains are a staple of the Viennese Classicists, as can be readily heard in the opening of Mozart's Symphony no. 40 or the slow movement of Beethoven's Piano Sonata, op. 106, "Hammerklavier" (especially mm. 78–86), which we know impressed Dvořák greatly.[53] But again, the importance that this

[52] The C-zone is seamlessly blended into a retransition to what is seemingly an expositional repeat, but proves to be the development section (with a feint toward expositional repetition). This device is common in Dvorak's work as well, especially those written after the beginning of his friendship with Brahms (see Example 3–1).

[53] For example, when teaching this piece to his composition students in Prague, he exclaimed about mm. 13–14, "That is something! That is profundity! That is an abyss!" Clapham, *Dvořák*, 173.

compositional procedure assumes in Brahms's repertoire should not be overlooked.[54] In the finale of Brahms's First Symphony, the freely imitative falling thirds are also harmonized in tenths (see mm. 232–43 and 257–67; Dvořák's passage also lasts about ten measures). Another similarity between Brahms's symphony and Dvořák's sonata is subtler, involving the pacing and shape of the coda. In m. 286 of the Violin Sonata the rhythmic activity ceases; static chords with the left hand very deep in the bass highlight the main theme, marked *tranquillo* (the dynamic is *pianissimo*). The following upward arpeggios and *poco stringendo* to the climactic forte of m. 306 give the whole passage the effect of *reculer pour mieux sauter*, a period of repose before the final thrust toward the ultimate cadence. The finale of Brahms's First Symphony has a very similar effect at m. 371. Tremolando, *piano* strings, accompanied by the contrabassoon, arrest the immediately preceding motion, which was frantic and syncopated, before ascending arpeggios in the violins introduce the *stringendo* to the Più Allegro (m. 391).[55]

The vi–IV–I plagal cadence that ends Dvořák's first movement is very common in nineteenth-century music, but this plagal cadence is also a major feature in Brahms's First Symphony (and the first movement of the Second). By itself, Dvořák's plagal cadence is an unmarked feature typical of nineteenth-century closure; taken with the other Brahmsian traits present in the movement, and given the relative rarity with which it occurs in Dvořák's earlier

[54] Although the bulk of scholarship surrounding Brahms's use of descending thirds, especially their extramusical associations with death and/or suffering, revolves around music written after 1880 (and thus after Dvořák's composition of the Violin Sonata), there are some articles that deal with descending thirds in his earlier music, such as Roger Moseley, "Reforming Johannes: Brahms, Kreisler Junior and the Piano Trio in B, Op. 8," *Journal of the Royal Musical Association* 132, no. 2 (2007), 252–305.

[55] Dvořák uses the device in a similar way in the finale of op. 57 at rehearsal P. Brahms also uses this technique in the finale of his Second Symphony, m. 353ff. (rehearsal O). Brahms's symphony also features a long chain of descending thirds in mm. 349–52.

(and later) works, it becomes a further piece of circumstantial evidence in favor of the theory that Dvořák was consciously modeling the style of Brahms.[56]

We can find several Brahmsian rhythmic and/or metric traits in the first movement, expanding upon Clapham's brief observations (see p. 257, note 46). The first is that the triplet figure (marked "*y*" in Example 4–4), initially introduced as an anacrusis, is stated on a downbeat in m. 19, the beginning of the transition (Example 4–4b). Coming as it does after a hemiola and a short grand pause, however, there is the possibility for metric misunderstanding on the part of the listener; its imitative treatment at this point certainly does not clear up the rhythmic picture. Another clear case of Dvořák masking the underlying meter occurs at the entrance of the S-theme (Example 4–5b), which is preceded by four measures of an unmistakable hemiola figure (mm. 46–49). The S-theme itself articulates hemolia in its first two measures; the still stronger projection of hemiola in the immediately preceding measures will predispose the listener to perceive hemiola across the sectional boundary, creating a special kind of linkage technique. Both hemiola and linkage technique are extremely typical of Brahms's mature work.

A further Brahmsian rhythmic feature of Dvořák's op. 57 is the preponderance of cross-rhythms, which are nascent in m. 4 with the simultaneous eighth-note triplet and dotted eighth-sixteenth figure.[57] Indeed, 2:3 and 4:3 relationships are played out in the numerous direct cross-rhythms (see mm. 20, 58ff., and 83ff.), as well as in the many hemiolas throughout the piece (in

---

[56] Plagal cadences occur relatively rarely in Dvořák's earlier works, especially those that utilize sonata form. Beginning with the first movement of the Sextet in A Major, op. 48, however, we find many more of Dvořák's sonata-form works ending plagally, especially those written around 1879–81. Cf. the finales of the Sixth and Seventh Symphonies and the Piano Quartet in E♭ Major, op. 87. There are also significant plagal inflections in the endings of the first movements of the String Quartet in E♭ Major, op. 51, and String Quartet in C Major, op. 61

[57] Dvořák clearly intended that the dotted rhythm in m. 4 not be accommodated to the triplet (as it would have been, for example, in the music of Schubert). This is proved by the notation of mm. 15–17, where the rhythm quarter-eighth under a triplet appears as a softened version of the dotted rhythm of m. 4. The difference in notation surely implies a difference in performance.

addition to those already cited, see see mm. 15–18 and passim). Although hemiola is a feature of the *furiant* and is present in a great many of Dvořák's earlier works, we might see its use in op. 57 as an homage to Brahms, especially given the sheer density of cross-rhythms in this piece and the presence of other Brahmsian traits.

Finally, we may note that the Violin Sonata is not a national work in the way that the Sextet and String Quartet in E♭ were (or were commissioned to be). This allows its Brahmsian traits to come to the fore. For both the first and second movements, Dvořák uses few of the national colors he was capable of drawing from his palette. Even in the finale, which has a dance-like constitution, the Czech or Slavic elements are only painted in the broadest of strokes. Though it does have two subordinate themes that outline a Moravian modulation (F minor to E♭ major), there are few other national/ethnic traits (or Wagnerian elements) to detract attention from the Brahms-like conservatism of the work.[58]

Symphony no. 6 in D Major, op. 60

I will not dwell too long on the similarities between Dvořák's Sixth Symphony and Brahms's Second, since they have been covered in some depth by prior commentators.[59] I have

[58] The Moravian modulation comprises two adjacent keys, the second of which is a whole step lower than the first. See Clapham, 39, and pp. 42–44 above, including Example 1–12.

[59] Beveridge, 268–79; Clapham, 72–76; Döge, *Antonín Dvořák*, 172–78; Tovey, *Essays in Musical Analysis*, 268–69; Julius Harrison in *Antonín Dvořák, His Achievement*, ed. Viktor Fischl (London: Drummond, 1943; reprint Westport, CT: Greenwood Press, 1970), 272-282; Robert Layton, *Dvořák Symphonies and Concertos* (Seattle: University of Washington Press, 1978), 30–36; Peter Petersen, "Brahms und Dvořák," in *Brahms und seine Zeit*, ed. Constantin Floros, Hans Joachim Marx and Peter Petersen (Laaber [Germany]: Laaber-Verlag, 1984), 125–46; Michael Beckerman, "Dvořák and Brahms: A Question of Influence," *The American Brahms Society Newsletter* 4, no. 2 (Autumn 1986): 6–8; andLukas Haselböck, "Dvořáks 6. Sinfonie: Ein 'intertextueller' Kommentar zu Brahms' 2. Sinfonie?" *Hudební věda* 41, nos. 3–4 (2006): 341–54. Cf. also Jarmilla Gabrielov**á**, "Antonín Dvořák und Johannes Brahms: Bemerkungen zur Kompositionsproblematik der Symphonie Nr.6 D-Dur, op. 60," *Die Instrumentalmusik (Struktur-Funktion-Ästhetik): Brno XXVI 1991*, 157–64. Not only does Gabrielová offer one of

covered the similarities between these two works with respect to harmonic details, orchestration, and texture in chapter 1, pp. 57–60. With respect to form, Dvořák's finale does bear a resemblance to Brahms's, but mostly in the character of the initial presentation of the primary group. Both works present a scurrying, *piano* theme that refers to the first movement. This strategy can also be found in earlier pieces, such as Beethoven's String Quintet in C Major, op. 29; thus it offers circumstantial evidence, at best, in a discussion of influence. Stronger evidence can be found in Dvořák's deployment of a climactic V^7 chord in mm. 37–38, which echoes Brahms's similar use in m. 23. For a discussion of the similarity in orchestration of parallel moments in the two finales and for a score reduction of these passages, see pp. 58–59 and Example 1–18. Both climactic chords usher in a *fortissimo* restatement of the movement's opening material that ultimately functions as the basis of the transition.

There are some formal resemblances between the first movements as well, although they do not extend to the level of the deep middleground. Brahms's first movement has a three-key exposition (D–f♯–A), whereas Dvořák's has only two main keys (D–b/B).[60] The resemblance between these movements is strongest in the construction of their P-themes, which both articulate an expanded I–ii–V progression, although in terms of proportion, Dvořák spends much more time than Brahms on the ii *Stufe*. A further resemblance involves the use of a "new" motive comprising seven *staccato* eighth notes in similar formal positions (Brahms, m. 66,

---

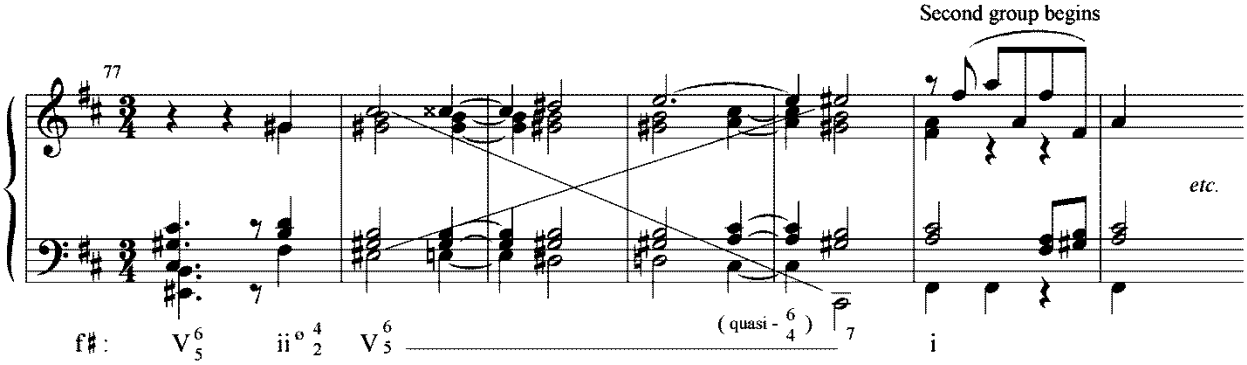
the most detailed comparisons of the two works in question, she also draws insightful connections between Dvořák's work and Beethoven's *Eroica*.

[60] For insightful analyses of the Brahms symphony, see Carl Schachter, "The First Movement of Brahms's Second Symphony: The Opening Theme and Its Consequences," *Music Analysis* 2, no. 1 (1983), 55–68 and Peter H. Smith, "Harmonic Cross-Reference and the Dialectic of Articulation and Continuity in Sonata Expositions of Schubert and Brahms," *Journal of Music Theory* 50, no. 2 (Fall 2006), 143–79. The exposition of the first movement of Dvořák's Sixth, with its S-zone placed in VI, is constructed along the same lines as the preceding sonata-form work, the Violin Sonata, op. 57. Indeed, there are several inter-opus connections between these two works, including the sequential use of descending fifths articulated by ascending steps as a kind of transitional/developmental device; see op. 57, i, m. 64ff. and op. 60, i, m. 78ff.

within TR; Dvořák, m. 24, just before TR). Both composers use omnibus progressions to create a wedge-like approach to important structural events in the expositions of their first-movements expositions.[61] Brahms expands the dominant of F♯ using a hemiola and an interpolated III^6 (acting a bit like a cadential six-four chord) in the classical omnibus C♯$^6_5$ – "E"^{7}–g♯$^6_4$– E$^4_2$ – (A^6) –C♯^{7} (mm. 78–81) to introduce his second group;[62] Dvořák's partial omnibus, F♯$^6_5$ –A^7–c ♯$^6_4$–A$^4_2$ (mm. 43–48), emerges from a♯^{o7} and leads to the P-based transition which begins at m. 49 (see Example 4–6). Also like Brahms, Dvořák uses hemiola to rhythmically highlight the upcoming structural event.

Example 4–6. Omnibus progressions in Brahms and Dvořák.

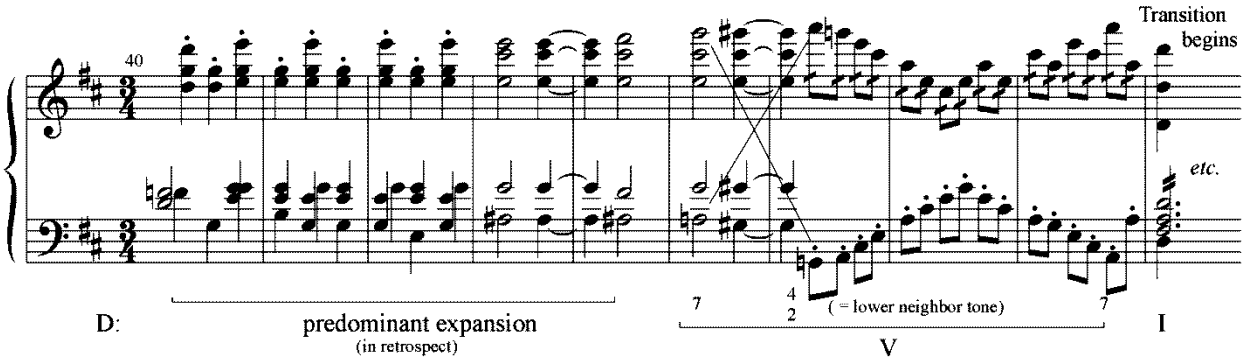
a. Brahms, Second Symphony, i, mm. 77–83. Omnibus begins on downbeat of m. 78.



[61] Here I refer to the F♯ minor melody in the Brahms as a second subject, after Schachter. As in most three-key expositions by Schubert and Brahms, the second key exhibits S-rhetoric but the EEC is achieved in the third key.
[62] On the "classical omnibus" and omnibus progressions in general see Victor Fell Yellin, The Omnibus Idea (Warren, MI: Harmonie Park Press, 1998). For an historical discussion see David Damschroder, *Thinking about Harmony: Historical Perspectives on Analysis* (New York: Cambridge University Press, 2008), 132–35.

Example 4–6. continued.

b. Dvořák, Sixth Symphony, i, mm. 40–48. Partial omnibus begins on beat 2 of m. 44.



Assertion #4. **Some aspects of Dvořák's sonata styleare original and are not beholden to the influence of Schubert and Brahms.**

In spite of the emphasis placed in the preceding pages on aspects of influence, there are formal features in Dvořák's mature works that are original to him and not beholden to the sonata practices of Brahms and Schubert. We need only recall the double MC in the op. 51 quartet and the expositional *Anlage* of keys that arpeggiate an E♭ major-seventh chord. We can also find abundant examples of Dvořák's originality in chapter 3 regarding MC- and EEC/ESC-moments. Obvious examples include: the use of pedal point or contrapuntal cadences at the EEC- or ESC-moments in the String Quartet in D Minor, op. 34; the large-scale half cadence that terminates the exposition of the first movement of the Violin Sonata in F Major, op. 57; the modulating CF after the MC of the Piano Quartet in E♭, op. 87; and the deformational recapitulation of the Ninth Symphony, which restates the iii/III of the expositional S-zone in ♯iii/♯III. A further example of how Dvořák expanded sonata form in an original and striking way will be covered in the next

chapter with regard to the first-movement development section of the String Quartet in C Major, op. 61.

Conclusion.

The increasing contact that Dvořák had with Brahms, his opinions, and his music, especially after early 1879, allows us to speculate that his influence helped not to alter but to *cement* the trends already perceptible in the works of Dvořák's first maturity. This seems to have happened in two main ways, the first of which involved Brahms's deep knowledge of and fondness for Schubert's music. We might imagine that Brahms approved of the formal and harmonic affinities with Schubert already present in Dvořák's music, that this approval was important to Dvořák, and that Brahms may have drawn Dvořák's attention more closely to certain formal aspects of Schubert's work, especially with respect to expositional construction and recapitulatory processes. For example, Dvořák crafted a three-key exposition in the first movement of the String Quartet in C Major, op. 61 (1881), that follows the Schubertian model much more closely than any of his earlier three-key expositions; such a close adhesion to this model might not have happened without his contact with Brahms and his circle (or it might have happened later in Dvořák's career). The second main way that Brahms probably influenced Dvořák's compositional style, especially in the early to mid-1880s, was by providing a direct model for certain works; Dvořák's Violin Sonata and Sixth Symphony are exemplary in this regard.

Thus it is entirely appropriate to discuss Brahmsian elements in a work such as the Piano Trio in F Minor, op. 65 (1883), but less tenable to do so for a work such as the Piano Concerto in

G Minor, op. 33 (1876). Although the concerto has certain formal resemblances to Brahms's Piano Concerto in D Minor, op. 15 (published 1874), we might consider these to be emblematic of the well-known phenomenon in which contemporaneous artists often create works which, for all their independence, are remarkably similar. Even more interesting than these musical coincidences are the resemblances between artworks that are created after the meeting of two artists and the commingling of their ideas.

One of the main themes connecting the chapters of this study is that Dvořák was a gifted and multifaceted composer, extremely competent in the craft of composition, and, very often, highly original. Originality (or genius), however, is often best understood against the background of an historical praxis, that is to say, the conventions and stylistic traits of pre-existing artworks and the various influences they provide. In this chapter, I have attempted to explain where some of Dvořák's inspiration came from, how it came about, and how it is manifest in his music. In so doing, I have also tried not to lose sight of the ways in which Dvořák went beyond these influences in creating his own distinctive authorial voice.

Part III. Voice Leading.

CHAPTER 5.

In addition to his skill handling large-scale form, Dvořák's ability to organize musical material at the intermediate levels of structure is worthy of attention. In this, the final portion of my study of Dvořák's music, I will investigate the way in which he uses voice leading to create continuity across large swaths of music. I will draw on several works from Dvořák's maturity; but I will focus particular attention on certain passages from the String Quartet in C Major, op. 61. Although this chapter is concerned with form to some extent, the instantiations of Dvořák's voice leading in which I am most interested are often located at middleground levels. As such, they merit investigation on their own accord outside of—but tangential to—a discussion of formal issues such as can be found in chapters 3 and 4. The two main types of voice-leading under examination can be categorized as follows:

1) Voice leading within sectional boundaries
2) Voice leading over sectional boundaries

The passages under consideration will often contain successions of harmonies that are not fully explicable by traditional harmonic analysis or the kinds of chromatic analytical techniques, such as neo-Riemannian transformations, that I explored in chapter 2. Linear factors will frequently provide the best means of explaining why these passages are intelligible. These factors typically can be related to traditional voice-leading paradigms such as voice exchange, parallel tenths or sixths, or sequential linear-intervallic patterns (such as 5–6 series or 2–3

suspension chains). In many cases, these voice-leading paradigms will persist despite changes in surface design (i.e., changes in melodic patterning, texture, instrumentation, dynamic contour, etc.).

Voice leading within sectional boundaries

This section of the chapter will provide examples of Dvořák's use of voice leading to unify a portion of music within a section of the musical form. In other words, these voice-leading situations conform to the formal design. Like other tonal composers, Dvořák often terminates a linear process either at or shortly before a formal boundary. The voice-leading segments analyzed below do not overrun sectional boundaries, but may sometimes help to define them. That is, these voice leading segments help coordinate a formal and tonal alignment between the inner form and the outer form.[1] Examples 5–4 and 5–5 will illustrate this concept. Example 5–4, taken from the String Quartet in C Major, op. 61, shows the alignment of the end of a voice-leading segment with the articulation of the MC. Example 5–4, taken from the String Sextet in A Major, op. 48, shows the alignment of a voice-leading segment with the EEC. Other examples in this section show how Dvořák uses linear processes completely within a single section, without engaging formal boundaries.

That any movement instantiates voice leading within a sectional boundary does not preclude it from also evincing the same across sectional boundaries, either at different levels of structure or across other formal sections elsewhere in the work. We will see that the String

[1] The terms "inner form" and "outer form" are adopted from William Rothstein, *Phrase Rhythm in Tonal Music* (New York: Schirmer Books, 1989). See also Eric McKee, "Auxiliary Progressions as a Source of Conflict between Tonal Structure and Phrase Structure," *Music Theory Spectrum* 18, no. 1 (Spring 1996), 51–76.

Quartet in C Major, op. 61, provides us opportunities to study both kinds of voice leading, though we will start with those passages that lie within sectional divisions.

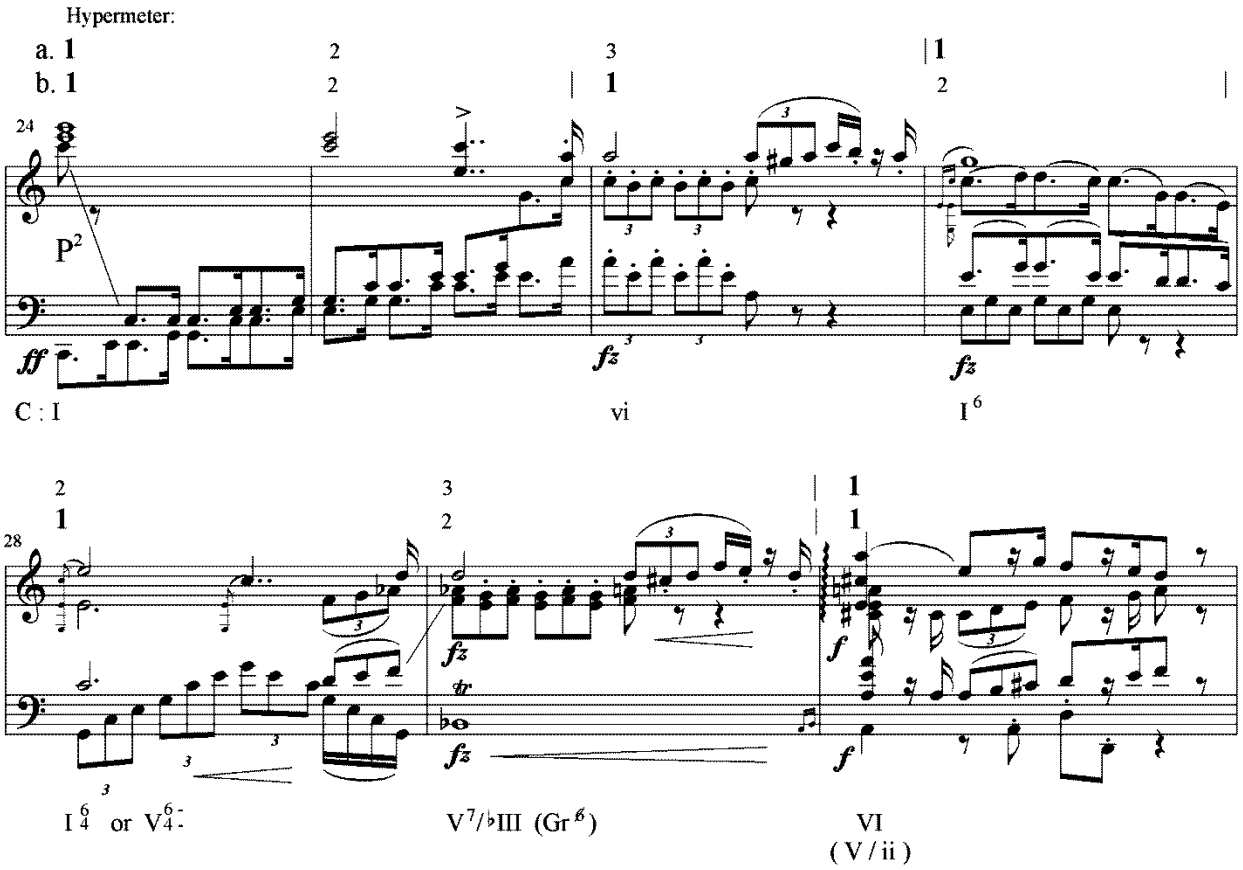
In the first-movement exposition of the op. 61 quartet there are two passages before the medial caesura that are best understood as being governed by linear processes rather than functional harmonic progressions. The first passage begins at m. 24 in the P-zone. Here, Dvořák introduces a variant of the P-theme (marked P^2 in Example 5–1) that introduces a surprising A-major chord after six measures.[2] These six measures are somewhat ambiguous metrically. There is a repeated three-measure motivic design in mm. 24–29, suggesting a hypermeter of three measures (2 x 3), but it is also possible to hear the six-measure group as continuing the previous duple hypermeter (3 x 2). The competing interpretations of Example 5–2 (with simplified registers) will affect how one understands the structural meaning of this passage, especially the nature of the six-four chord in m. 28. In the first case, which demonstrates the three-measure hypermeter (Example 5–2a), the tonic is prolonged until the augmented-sixth chord in m. 29, whose bass tone functions as a passing tone between C and A. The second case, which demonstrates the duple hypermeter (Example 5–2b), gives greater emphasis to the vi chord in m. 26 (emphasizing the modal shift to VI in m. 30) and the six-four chord in m. 28.

The six-four chord in m. 28, on the strong hyperbeat in this interpretation, would act most like a cadential six-four. Its resolution is not to the typical five-three, however, but to an augmented-sixth chord whose bass unfolds the upper minor third of the dominant. Instead of the large-scale passing tone of the first case, the second case is a type of deceptive cadence mediated by an augmented sixth.

---

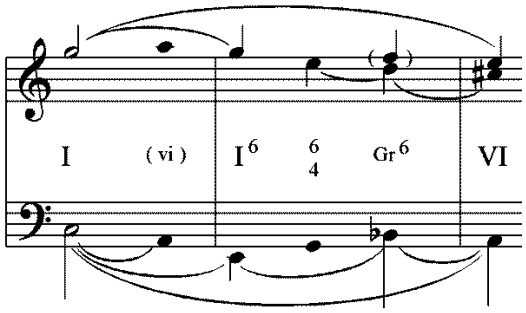
[2] This A-major chord is the first of several associative-harmonic references throughout the movement to the striking half-diminished chord of m. 3, which contains the pitches C–E♭–G–A.

Example 5–1. String Quartet in C Major, op. 61, i, mm. 24–30. Two possible hypermetric interpretations.

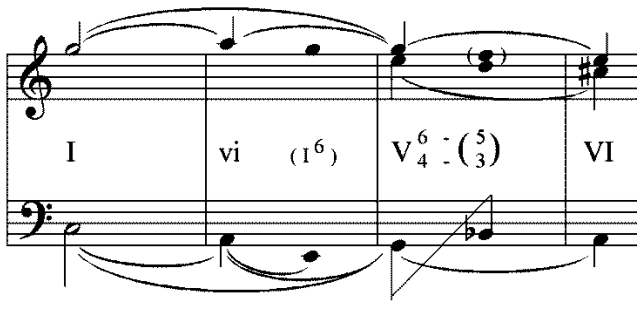


Example 5–2.

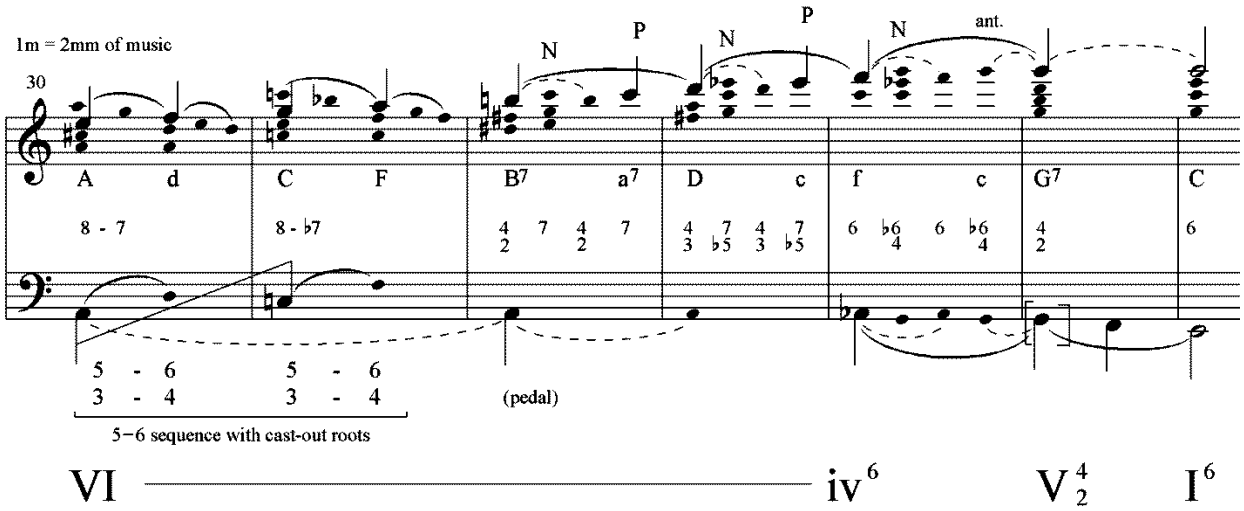
a. three-bar hypermetric interpretation
(1 m. = 3 mm. in the score)



b. two-bar hypermetric interpretation
(1 m. = 2 mm. in the score)



Example 5–3. String Quartet in C Major, op. 61, i, mm. 30–42, harmonic reduction. Stepwise top-voice ascent unifies the entire passage.



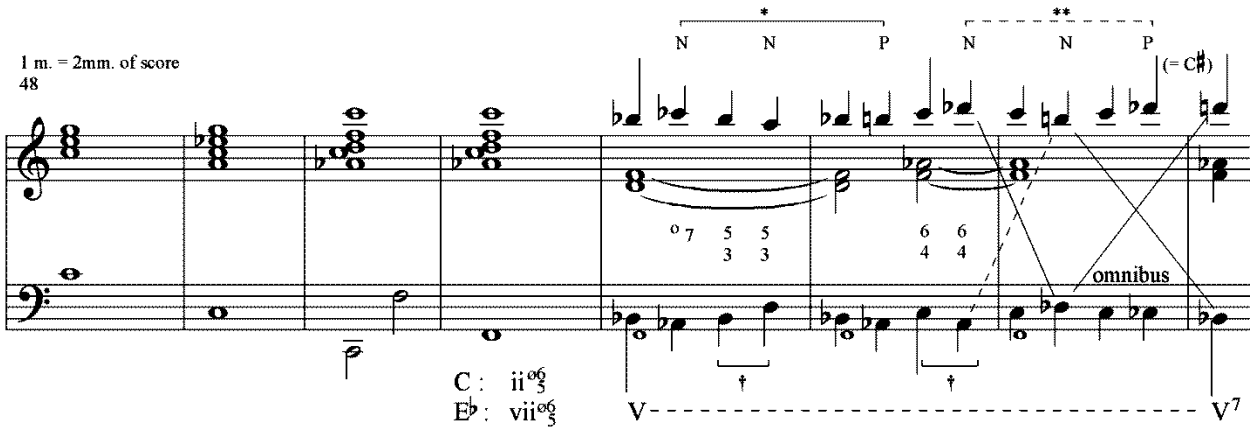
The metric ambiguity of the passage is a prelude to the harmonic ambiguity of the next thirteen measures. The A-major chord at m. 30 initiates a large-scale ascent that returns, over the course of thirteen measures, to G6, the *Kopfton* in its obligatory register (see Example 5–3; *Kopfton* issues are discussed below). The interior harmonies of this passage might be understood as incidental to the rising stepwise melody of the top voice. Measures 32–33 are a sequential repetition of a $\frac{5}{3}-\frac{6}{4}$ contrapuntal motion with cast-out roots. The surface figuration changes at m. 34, as does the manner of harmonic progression, which becomes even more nonfunctional, but the rising stepwise line continues to provide the connective tissue.[3] The arrival at a first-inversion F-minor triad (m. 38) signals the return to functional harmony and the descent to I^6 through a dominant four-two chord. Whereas Examples 5–1 and 5–2 ended with the salient VI chord, Example 5–3 ends at m. 42 at a salient I^6, the signal of the beginning of the expanded

[3] Since the downbeat at m. 34 is literally a dominant four-two chord on B, the motion from the F major triad of the prior measure is very close to the ic 5-5 transform that links F^7 with B^7.

cadential progression that terminates at the beginning of P-counterstatement six measures later (which becomes the TR).

The rising stepwise line of the soprano voice in mm. 30–42 invites a retrospective interpretation that treats Example 5–2a as the better reading. As the soprano ascends from E5 to G6, a linear descent might be heard in the bass from the C in m. 24 to the E of m. 42. They move in different rhythms (the bass has already moved C–B♭–A by the time the soprano begins its ascent), but the wedge-like contour of the outwardly expanding stepwise lines seems to provide a shape to this swath of music that is not attributable to harmony alone.

Example 5–4. Harmonic reduction of TR (mm. 48–62). Terminates in an omnibus progression.



The second voice-leading passage in the op. 61 quartet that precedes the medial caesura comes from the transition. This passage demonstrates the alignment of inner and outer form since the voice-leading segment terminates at the articulation of the MC (see Example 5–4). The counterstatement of P^1 dissolves completely into TR-rhetoric by m. 56. The half-diminished chord of mm. 52–55 resolves not to the dominant of C major, as might have been expected, but a B♭-major triad (see Example 5–4). Thus, there is a provisional change of key in which the half-

diminished seventh chord is understood as $\text{vii}^{\text{ø}6}_{5}$ in E♭ major.[4] The following six measures expand and intensify this dominant. It is this expansion to which I turn now.

The first part of the dominant expansion (beginning at m. 56) uses a technique familiar to us from the omnibus: a minor-third dyad is sustained throughout the elaboration.[5] Though mm. 56–57 do not contain the familiar succession of dominant-seventh and six-four chords that characterize the omnibus, D and F comprise the common dyad shared among the B♭-major and D-minor triads and the D fully-diminished seventh chord.[6] This latter chord first functions as a neighboring sonority to B♭ major, but upon its respelling as a B diminished-seventh chord it acts as a passing sonority to the F-minor six-four chord (see the bracket marked by an asterisk in the example).[7] The sustained dyad changes to F and A♭ at this point and ushers in a passage mostly understood as being structured by the omnibus (the characteristic voice exchanges of the omnibus are marked in the example by solid lines); the only chord not part of the omnibus is the second six-four chord in m. 59. If the bass had been C♭ (as it is in m. 61), this chord would also have been omnibus-derived (and part of the voice exchange). As it is, the falling major third in the cello from C3 to A♭2 is an inversion of the previously heard ascending major third from B♭2 to D3 (marked by daggers in the score) such that m. 59 is an analogic version of m. 57.[8] The top voice is again the governing line, as in Example 5–3. The bass voice—and the harmonies that it supports—might be understood as a dependent musical parameter. The entire passage

---

[4] This is not dissimilar to the Dvořákian procedure that uses V^4_3–V–I to harmonize $\hat{2}$–$\hat{5}$–$\hat{1}$ in the bass rather than initiating the progression with a more typical pre-dominant chord such as ii or ii^7.

[5] For a discussion of the post-MC part of the dominant prolongation, mm. 62–68, see pp. 174–75 and Example 3–9a.

[6] F2 also remains present since it is heard continually, as an anacrusis to the main bass tones, and thus functions as a quasi-pedal point (shown as small whole notes in Example 5–4).

[7] This is the same technique that Dvořák used in the passage shown in Example 5–3 in which a chord that had first been heard as neighboring is reinterpreted as a passing chord.

[8] This motivic relation is probably enough to allay fears of a misprint in the score.

convincingly prepares the MC-point without recourse to traditional harmonic progression. This is exemplary of Dvořák's ability to use voice leading (inner form) to delineate structural joins (outer form).

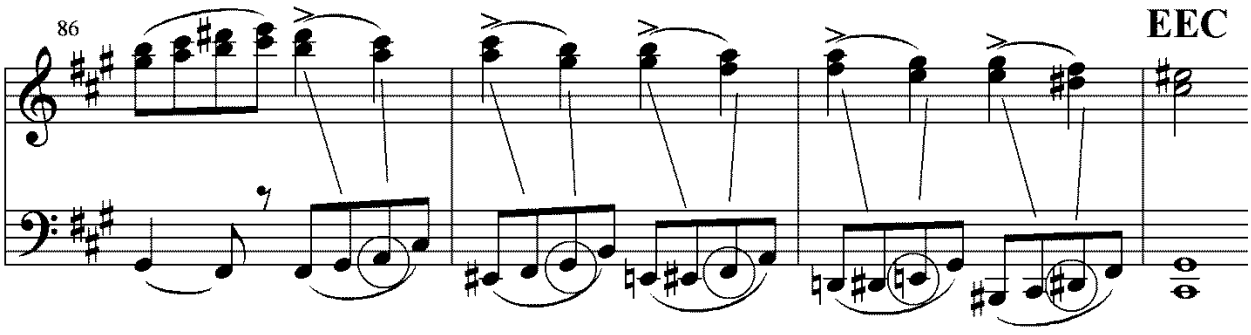
The approach to the EEC in the String Sextet, op. 48 (Example 5–5), is another good example of how Dvořák uses a voice-leading process to prepare a formal division. An excerpt from the score (Example 3–22) and a discussion of the formal aspects of this passage can be found on pp. 201–204. Unlike some other examples in this chapter, linear factors here are somewhat ambiguous with regard to their tonal implications. Therefore, the functions of the harmonies must be taken into account, which in this excerpt must be inferred, since, despite the presence of six instruments, there are only three real voices. A fourth (perhaps even a fifth) harmonic voice must be supplied by the listener.[9] The inferred voice(s) will help determine the tonal function of the chords leading up to the EEC. Remarkably for such a late stage of the exposition, the key of the forthcoming EEC is ambiguous: will the closure arrive in the key of E major or C♯ minor? There are logical musical factors in favor of either goal. E major, the global dominant, would be the Classical default for the EEC. C♯ minor, on the other hand, overwrites E major as a tonal goal in the original S-theme (mm. 57–60; see Example 5–6), so an EEC in C♯ minor would function as an overwriting of E major at a deeper level. This associative replication of a motive at a deeper level is a hallmark of Dvořák's style, a recurring large-scale strategy in many of his mature works.[10]

---

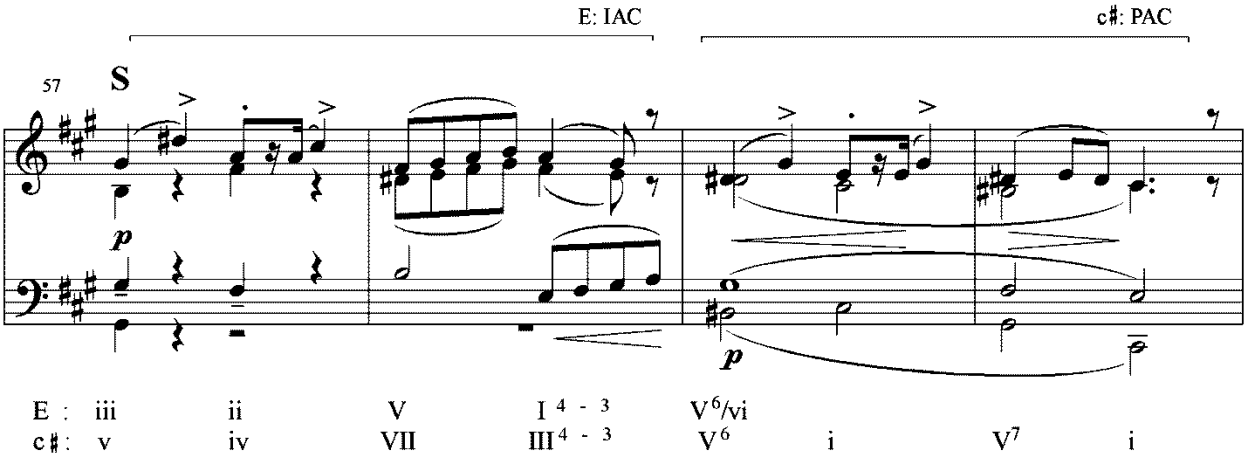
[9] For a discussion of the historical concept of the imaginary continuo see William Rothstein, "On Implied Tones," *Music Analysis* 10, no. 3 (1991), 289–328.

[10] I have already demonstrated how certain salient motivic materials may have formal ramifications later in a movement. See pp. 205–208 for my discussion of the formal realization of the arpeggiated major seventh chord that begins the String Quartet in E♭ Major, op. 51. See also the discussion on pp. 295–99 below, which deals with the formal processes connected with the common-tone half-diminished seventh chord of m. 3 in the String Quartet in C Major, op. 61.

Example 5–5. Textural reduction of the Sextet, i, mm. 86–90. Scalar descent to $\hat{1}$ articulated in the bass (shown by circled notes).



Example 5–6. The S-theme, mm. 57–60. E major is an intermediate goal in a phrase that closes in C♯ minor.



As may be seen in Example 5–5, tonal ambiguity persists into the measures immediately before the EEC. Beginning at m. 86, there is a strong suggestion that an octave line from E6 to E5 will lead to a cadence in E major, the potential realization of which is given in Example 5–7a (notice the multiple occurrences of A♮ and B♮ in the imaginary fourth voice of this hypothetical example). The bass gives us the first clue that C♯ minor (or major) will ultimately prevail: the

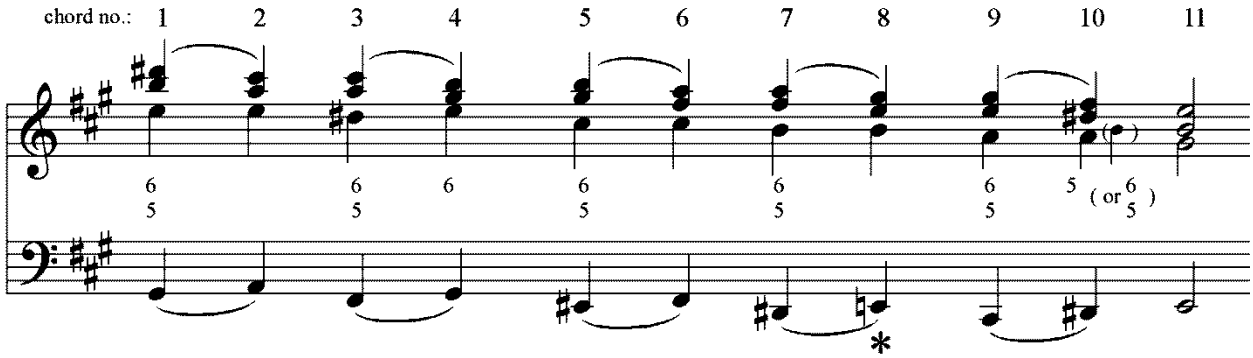
first eighth note in each group of four is not a chord tone but an appoggiatura; the chord tones fall on the second and third eighths (shown by lines in Example 5–5). Further, the first chord of each slurred pair is usually a seventh chord that resolves to a triad (in either root position or first inversion depending on the imaginary accompaniment), giving hierarchical privilege to the second chord in each group. Thus, the third eighth in each group has the most structural weight. As shown by the circled notes in Example 5–5, these weightier bass notes describe a clear linear descent at a deeper structural level, a descent that is harmonized by the soprano in parallel tenths.

Example 5–7b shows an inferred fourth voice that belongs more obviously to C♯ minor. This is because the imaginary note in chords 7 and 10 is now B♯, chord 9 now contains an A♯, and the chord at the asterisk is a first-inversion C♯-minor triad (instead of a root-position E-major chord as in Example 5–7a). Notice that the only outer-voice difference between the two versions of Example 5–7 is at chord 11 (E major in Example 5–7a and C♯ minor in Example 5–7b); thus, the harmonic functions imparted by the imaginary voice are almost totally dependent on the listener's aural understanding of the passage. I believe that the imaginary voice of Example 5–7b becomes the preferable inference upon repeated listening (and/or retrospective analysis) given the overall context of the S-zone. That is, given the S-theme cadence in C♯ minor in m. 60 and the EEC in C♯ major in m. 89, C♯ may be retrospectively understood as tonic throughout the passage.

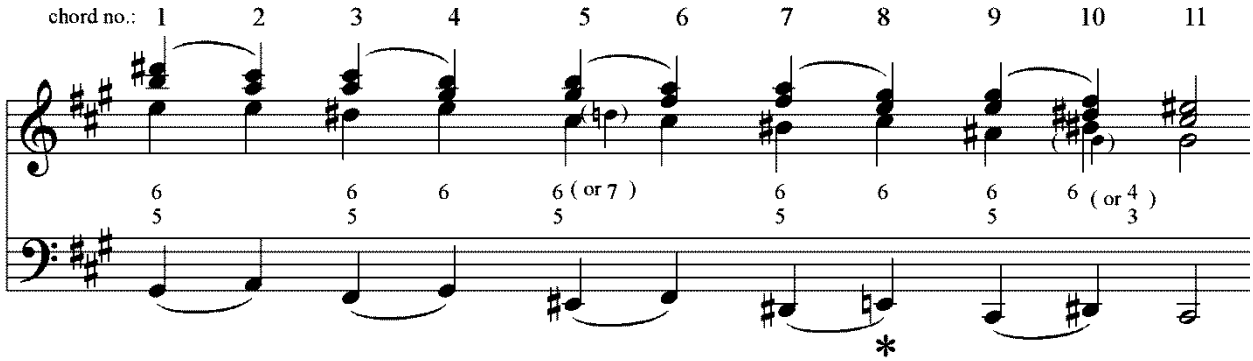
No matter how one hears the lead-up to the EEC, the Picardy-third quality of C♯ major is a truly surprising feature, providing a *denouement* of sorts after a harmonically ambiguous approach. The seemingly simplistic canonic writing and sequential material leading up the EEC mask Dvořák's sophisticated and subtle control of the voice-leading and his witty play with the functional-harmonic parameters of this passage.

Example 5–7. Different inferred tones lead to divergent harmonic outcomes.

a. Hypothetical harmonization of an octave-line from E6 to E5 leading to a cadence in E major.

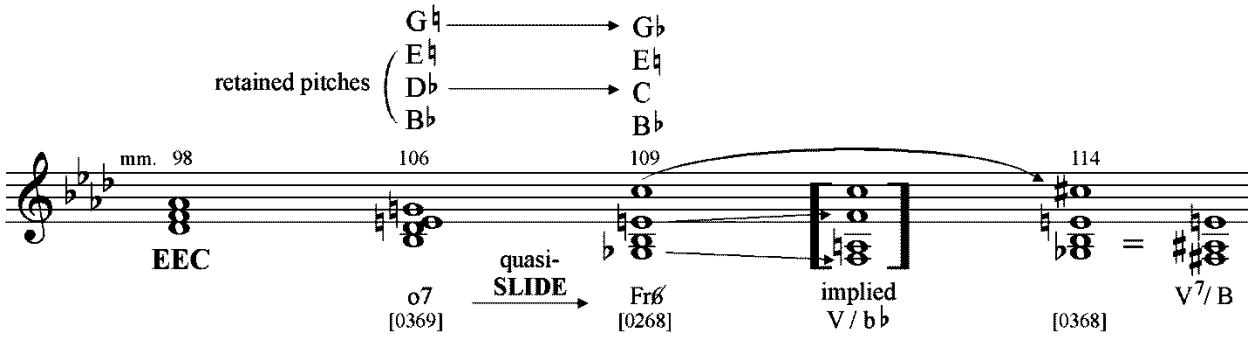


b. Imaginary fourth voice (down-stemmed notes) leading to a cadence in C♯ minor (or major).



As a final example of voice leading within sectional boundaries, I turn to the remarkable expansion that occurs at the beginning of the development in the first movement of the Piano Trio in F Minor, op. 65 (1883). The exposition closes in D♭ major and the development begins with an inverted common-tone diminished-seventh chord. Rather than realize any of the leading-tone implications of its chord members, Dvořák instead employs a SLIDE-like transformation, changing the common-tone diminished chord into a French augmented-sixth chord built on G♭ (which would imply that the dominant of B♭ minor is imminent; see Example 5–8).

Example 5–8. Harmonic reduction of Piano Trio in F Minor, op. 65, i, mm. 98–114.



This implied F-major chord is never realized, however, and Dvořák simply raises C a semitone to form an F♯ dominant-seventh chord. As can be seen from the set-class forms of the example, the three tetrachords of mm. 106–14 are related by parsimonious voice leading; this is not entirely surprising, since any dominant-seventh chord is only one semitone removed from either a French augmented-sixth chord or a fully-diminished seventh chord.[11] Indeed, from a harmonic standpoint, mm. 109–13 could have been entirely omitted without loss of syntactical meaning. If it had, however, we would have missed out on Dvořák's delicious enharmonic pun, in which the key-defining tritone E–B♭ of m. 109 is reinterpreted as E–A♯ in m. 114.

The arrival on B major for the first articulated key of the development is foreshadowed in the movement's opening measures, which contain B♮ as the first chromatic pitch. Thus there is an associative harmonic reference between the beginning of the development and the beginning of the piece. Yet the articulation of the primary theme in B major remains tonally surprising at the immediate experiential level because it seems that B♭ minor would have been the first key of

[11] In order to maintain the sonic character of the tetrachords, the ordering of pcs in Example 5–8 does not take into account inversional equivalence. Unlike Forte's set class 4-27 [0258], which encompasses the dominant-seventh and the half-diminished seventh chord, [0368] better represents the dominant-seventh flavor of this chord and more clearly shows its semitonal relationship to the fully-diminished seventh chord [0369] and French augmented-sixth chord [0268] that preceded it.

the development. There are two main reasons why a listener would expect B♭ minor. First, B♭ minor is the implied destination of the suppressed F-major chord shown in Example 5–8. More importantly, B♭ minor would logically continue the sequence of descending thirds that was initiated by the relationship of P (F minor) to S (D♭ major).[12] This tonal trajectory is hijacked by the arrival of B major, which stands in a Neapolitan relationship to the expected B♭ minor. The major-mode presentation of the P-theme at this point—in the context of the tonally remote local Neapolitan key—gives it the quality of what Robert Hatten has described as a "vision of grace" trope.[13] Indeed, the only other major-mode presentation in the entire work of the P-theme is in the coda, where it occurs in G major, the Neapolitan of the surrounding G♭ major.[14]

The way that Dvořák gets back on track, so to speak, is through voice leading. This voice leading is most apparent in the left hand of the piano part, which in m. 116 begins a series of ascending tenths (see Example 5–9).[15] These tenths are initially heard in ascending parallel motion, giving rise to the familiar diatonic paradigm I–vii^{o6}–I^{6}. By mm. 119–20, however, the diatonic parallel motion changes to chromatically inflected oblique motion, destroying the sense of functional harmony. The dominant pedal on F beginning at m. 121 reorients the ear back toward B♭ minor. This reorientation feints toward a major-mode resolution in m. 123 through

---

[12] Such large-scale chains of thirds—extending from the beginning of the exposition to the first tonal plateau of the development—are not uncommon in the Classical and Romantic eras. See Schenker's discussion of this progression in *Harmony*, § 131, where he analyzes Beethoven's Piano Sonata in B♭ Major, op. 106, "Hammerklavier" (I–VI–IV), and Brahms's Piano Quintet in F Minor, op. 34 (i–vi [respelled as C♯ minor]–iv).

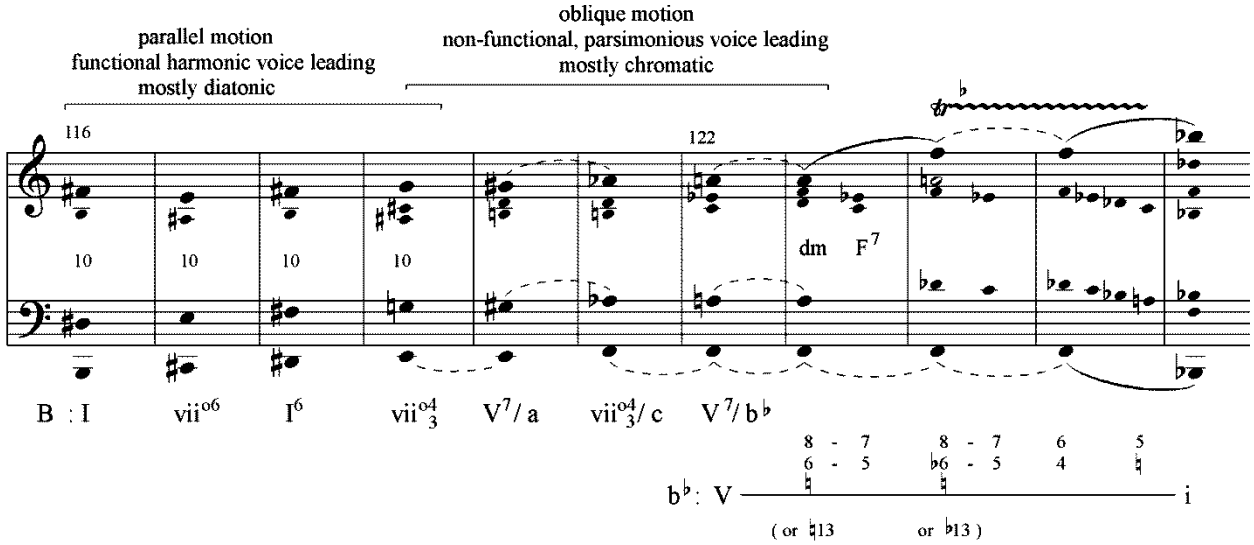
[13] See Hatten's discussion of Beethoven's Piano Sonata in B♭ Major, op. 106, "Hammerklavier," in *Musical Meaning in Beethoven* (Bloomington: Indiana University Press, 1994), esp. pp. 16–25.

[14] Neapolitan relationships abound in this movement and are foregrounded in the coda at m. 309, where an expanded G♭-major chord (the Neapolitan of the tonic key) gives way suddenly to a G-major chord. The latter functions as the Neapolitan of the Neapolitan rather than as an altered supertonic harmony of the home key. The music quickly returns to G♭ major, which itself then resolves, in typical Neapolitan fashion, to a cadential six-four on C in m. 314.

[15] The upper voice of the bass-clef tenths can also be heard as a doubling of the true top voice, which only emerges as a composite of the alternating violin and cello melodies.

the use of a first-inversion D-minor chord, which might be considered a proxy for the six-four chord (either neighboring or passing) over the dominant pedal. This major-mode implication is immediately negated by the D♭ of m. 124.

Example 5–9. Harmonic reduction of Piano Trio in F Minor, i, mm. 116–26. Diatonic voice leading gives way to chromatic voice leading.



Thus, parsimonious voice-leading processes frame the tender, *pianissimo* B-major passage that begins the development. The quasi-SLIDE transformation and semitonal displacement that turn a French augmented-sixth chord into a dominant seventh (shown in Example 5–8) are answered and balanced by the zigzag motion of oblique tenths shown in mm. 119–22 of Example 5–9. The affective quality here is one of an evanescent "vision of grace": B major exists only at a kind of magical tonal intersection, a transient and diaphanous key between the heroic D♭ major that closed the exposition and the postponed arrival of the stormy, *fortissimo* B♭ minor in which the development seemingly should have commenced.

Throughout this section, I have emphasized Dvořák's ability to use voice leading to unify areas of music completely within a formal section—as in Examples 5–1, 5–2, and 5–3—or, more often, as articulators of formal boundaries—as in Examples 5–4, 5–5, and 5–8—where they serve to align the inner and outer forms of a work. Additional examples can be found throughout this study, especially those that help define sectional boundaries: see the approach to the first MC of the Eighth Symphony's first movement (Example 3–14), the approach to the EEC and the ESC in the first movement of the op. 34 quartet (Examples 3–20 and 3–21), and the trio to the op. 61 quartet and its organization into arpeggiations of minor thirds (Example 2–32). Examples that are completely within sectional boundaries usually occur on a smaller scale (around ten or fewer measures) and can be found in Examples 2–17 and 2–18.

Voice leading over sectional boundaries

In other instances within Dvořák's oeuvre, however, voice-leading procedures link sections of music separated by a formal boundary. A good example of this can be found in the first movement of the Piano Quartet in E♭ Major, op. 87, in which the off-tonic thematic recapitulation of P begins at m. 146 but the return of tonic harmony does not occur until m. 171, halfway through a statement of S.[16] Such instances interact acutely with the piece's formal sections, suggesting conflict (or at least non-alignment) between inner and outer forms. While such conflicts are always possible, we must be ready to adjust any *a priori* formal assumptions that we might make about a piece as we engage in the act of analysis: the ways that the voice

[16] The op. 87 quartet is further complicated in its harmonic-rotational scheme by the return of S in B major at m. 160, an enharmonic spelling of the global ♭VI. Hepokoski and Darcy would say that this is a Type 2 Sonata and the term "recapitulation" is inappropriate; see pp. 353–87.

leading might unfold over a formal boundary may affect our understanding of the compositional plan of the piece as a whole.

As an extended example, I return to the String Quartet in C Major, op. 61. Like the examples from this work in the foregoing part of this chapter, it will be the melodic logic of the top voice that ties sections together rather than the traditional elaboration of the *Bassbrechung*. I will deal with two main voice-leading features of the first movement. The first is the idiosyncratic way that the work exemplifies Schenker's concept of interruption. I will explore the types of formal expectations generated by the I–♭III–V *Anlage* of the exposition; an initial encounter with this key scheme might trigger *a priori* assumptions of formal behavior. In this case, a linear descent to $\hat{2}$ might be expected by the end of the exposition.[17] In this case, the conflict between inner and outer form occurs when the linear descent to $\hat{2}$ does not happen at the boundary between the exposition and development, but rather completely within the development itself.

The second voice-leading feature regards the nonresolving recapitulation and the concomitant postponement of tonal closure and melodic descent until the coda. This is an obvious conflict between inner and outer forms, between the rotational plan of thematic modules according to sonata norms and the tonal unfolding of the *Ursatz*. Example 5–10, to which I will constantly refer, is a middleground reduction of the entire first movement, a discussion of which will ground the following discussion of voice leading over sectional boundaries.

The exposition (shown in Example 5–10a) seemingly follows a by-then orthodox Schubertian three-key model in which a remote key is interposed between the opening tonic and

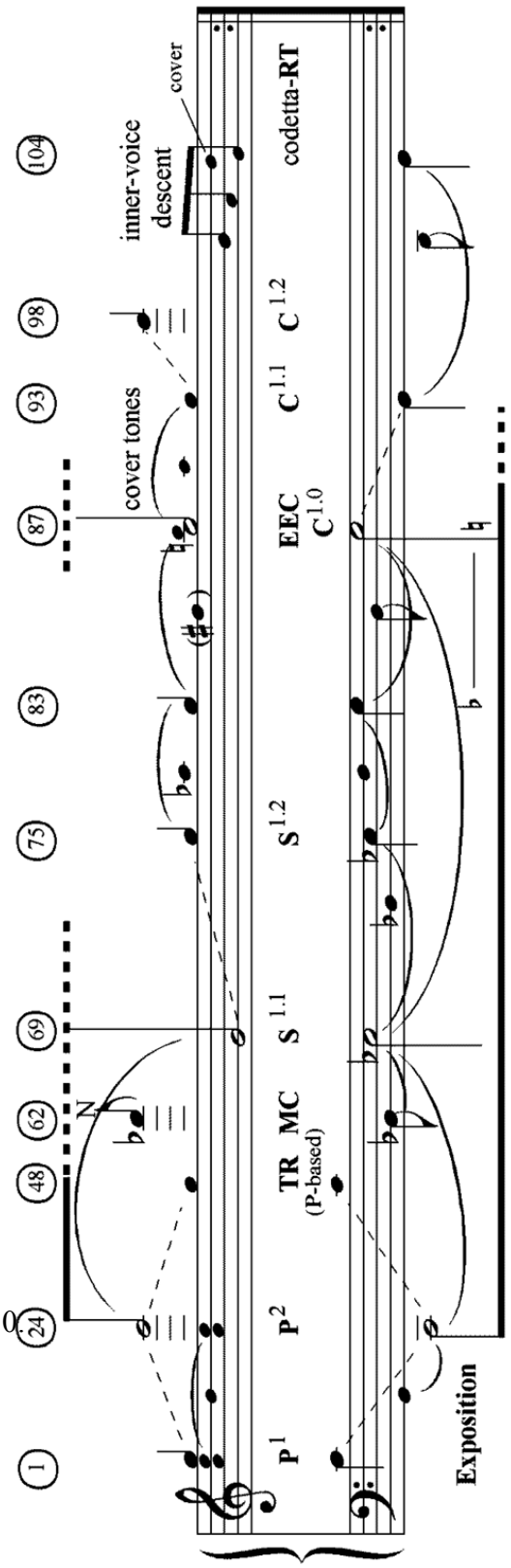
[17] The ZPAC, if present, would represent an inner-voice linear descent beneath the $\hat{2}$ of the fundamental line, as shown hypothetically in Example 5–11b.

the closing dominant keys.[18] The interpolation of E♭ major between C and G major in the exposition initially suggests two avenues through which an *Urlinie* descent to $\hat{2}$ could be made; these potential realizations of deep middleground expectation are shown in Example 5–11. No such realization is found in the op. 61 quartet, however. While it is true that the caesura-fill after the MC in m. 62 elaborates a top-voice A♭ and thus resembles the beginning of Example 5–11a, the remainder of Dvořák's second group resembles neither of these potential realizations.[19]

[18] For further discussion of this piece, refer to chapter 3. Medial-caesura issues are dealt with on pp. 173–75. EEC and ESC issues are discussed on pp. 226–30.

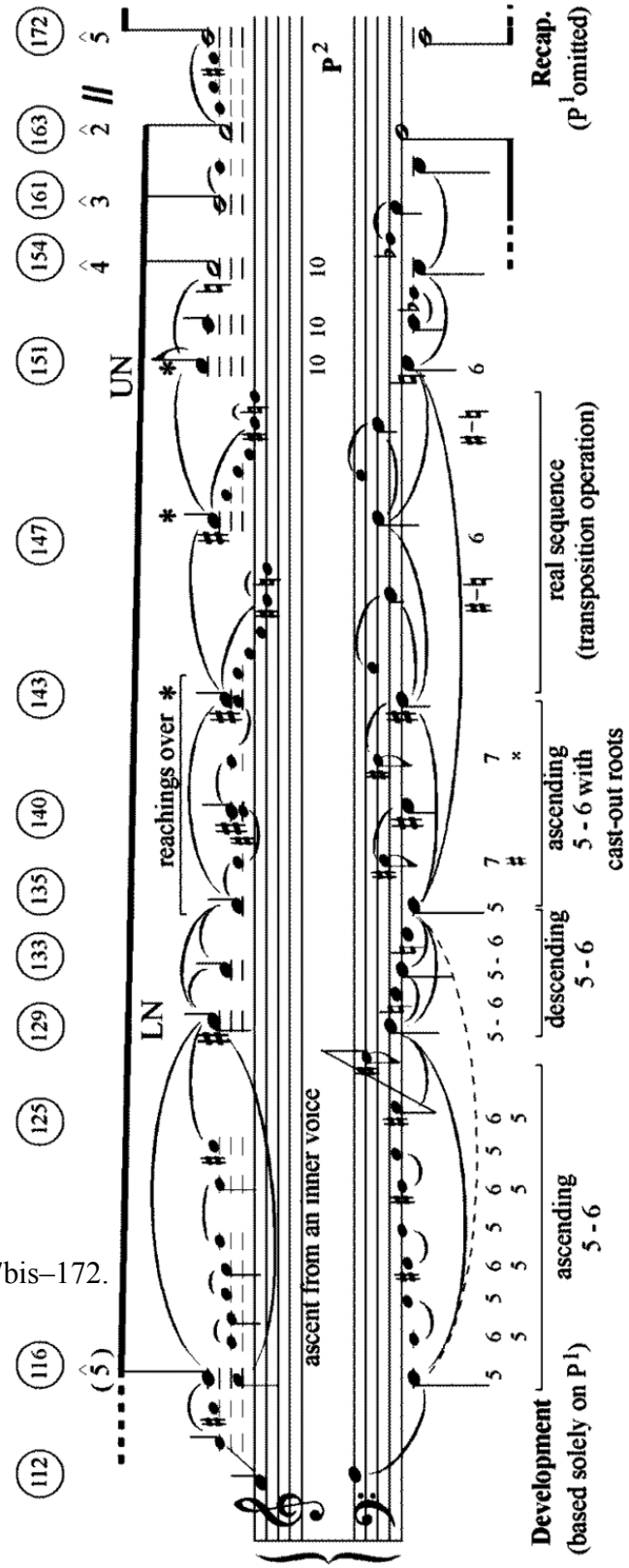
[19] Notice that in both examples $\hat{4}$ is supported by a B♭-major chord, acting as a local dominant. Example 5–11a is not Schubertian because there is a PAC in the second key of the three-key exposition. Both Schubert and Brahms avoided a PAC in the second key of their three-key expositions. Example 5–11b is a free adaptation of Example 12.12b in Allen Cadwallader and David Gagné, *Analysis of Tonal Music: A Schenkerian Approach* (New York: Oxford University Press, 1998), 373.

Example 5–10. Deep-middleground structure of the first movement.



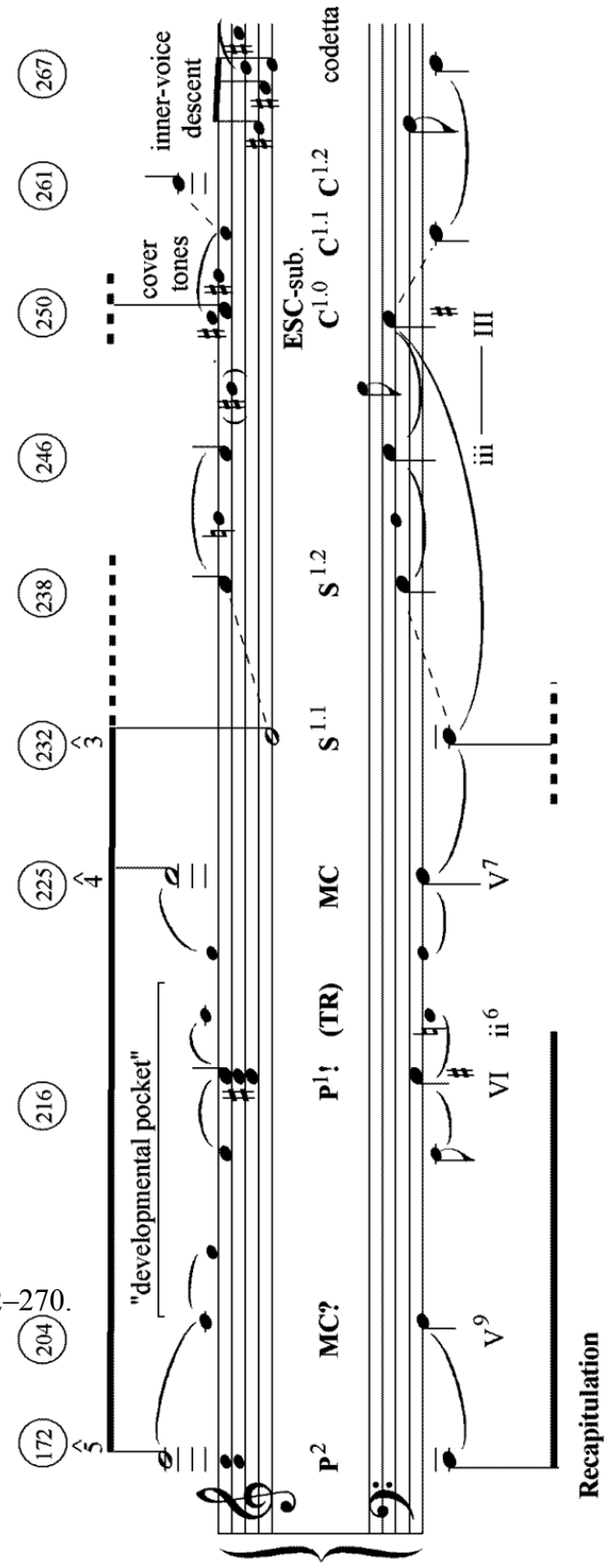
a. Exposition, mm. 1–110.

Example 5–10. continued.



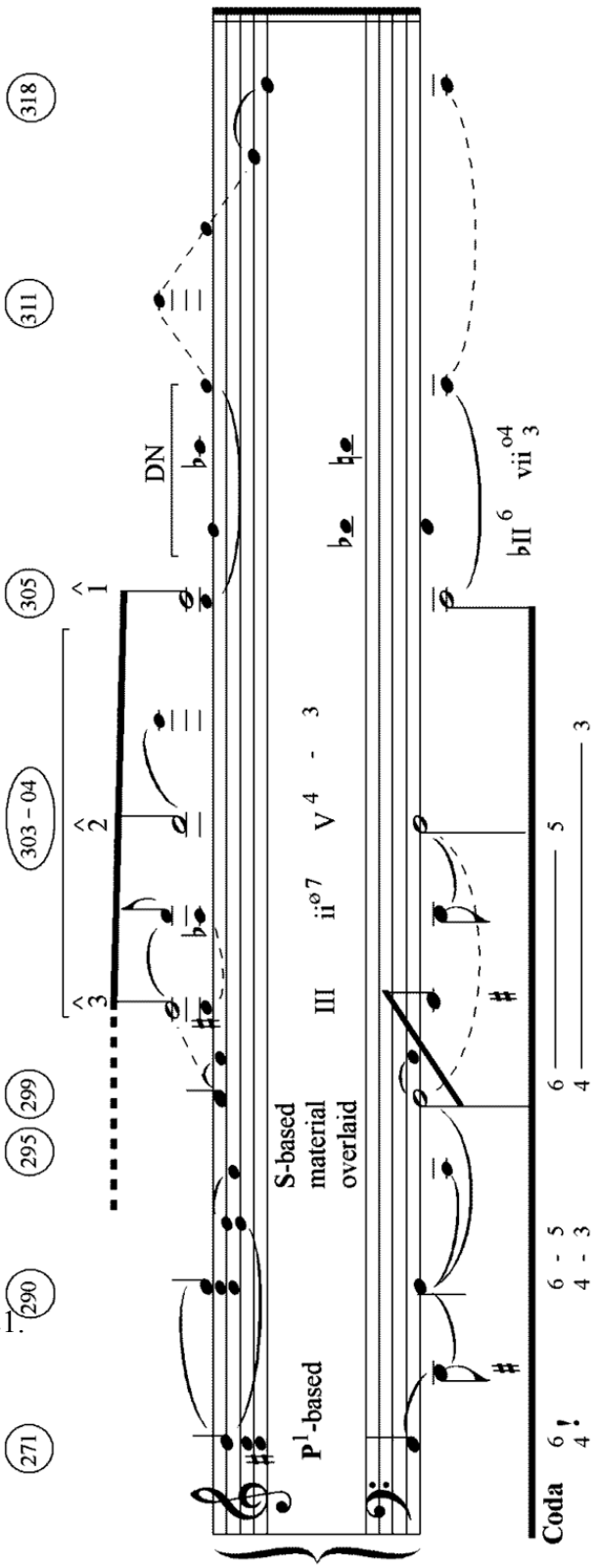
b. Development, mm. 107bis–172.

Example 5–10. continued**.**



c. Recapitulation, mm. 172–270.

Example 5–10. continued**.**

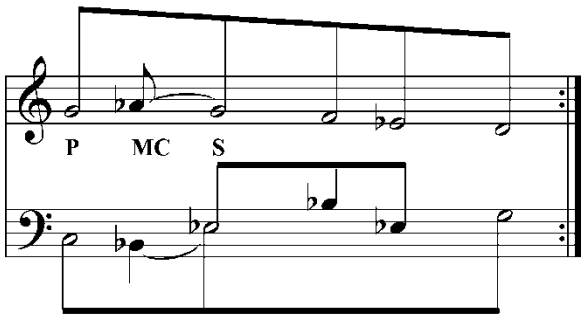


d. Coda, mm. 271–321.

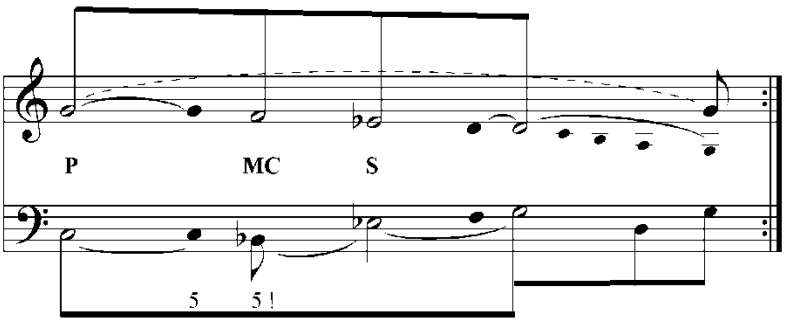
The second group (S-zone) begins in E♭ major with G in the top voice, but since there is no perfect authentic cadence in this new key the potential for melodic descent to E♭ is thwarted. A sequential passage beginning at m. 75 leads through F minor to G minor. With a Picardy-third resolution at m. 83, G minor gives way to G major, the key in which the EEC will eventually be made. As can be seen in the voice-leading reduction of this passage (Example 5–12), the top voice, G, is decorated in mm. 79–82 by an upper neighbor note, A♭ becoming A♮. Thus, at least in this portion of the S-zone, no melodic descent of the *Urlinie* occurs.

Example 5–11. Deep-middleground expectations for a modally mixed three-key exposition.

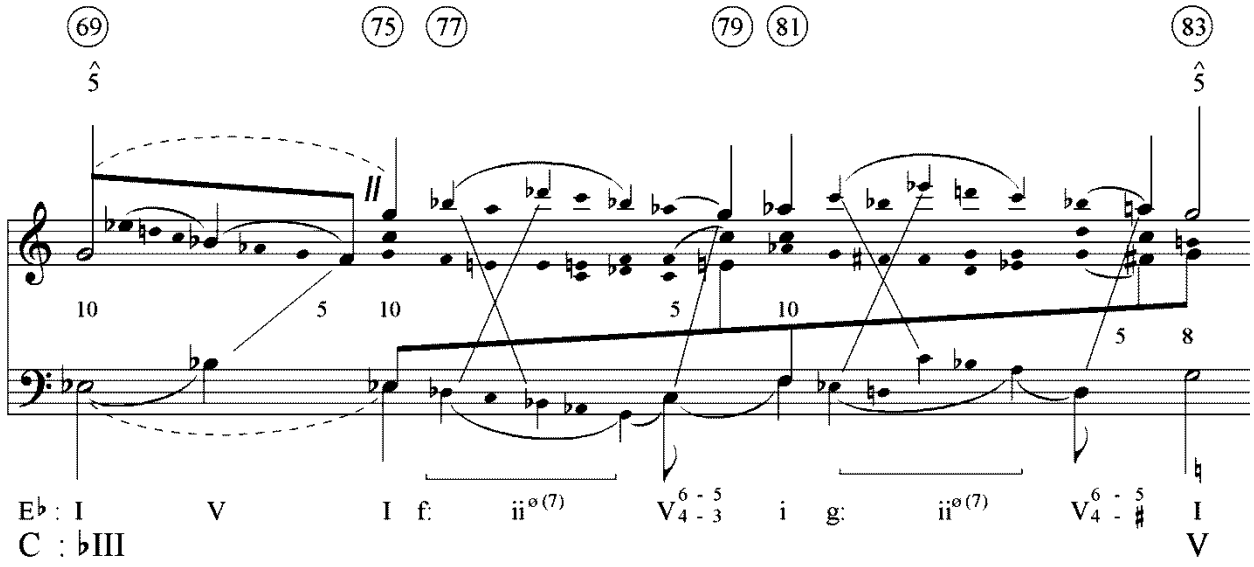
a.



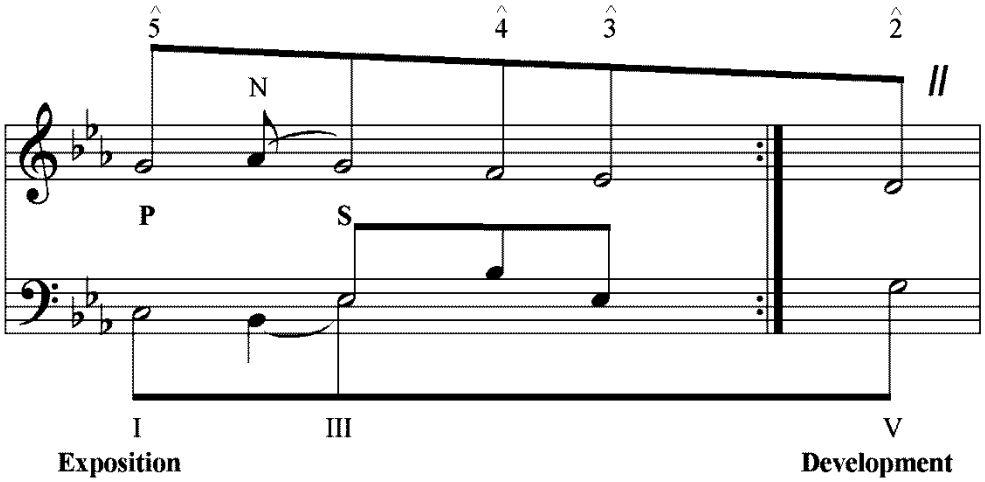
b.



Example 5–12. Detail of the beginning of S, mm. 69–83. No PAC occurs in E♭ major so that G is retained as the top voice.



Example 5–13. An interrupted $\hat{5}$-line in the minor mode. The descent to $\hat{2}$ occurs within the development.



Note how, at a deeper level, the upper voice remains static throughout the exposition. It hovers around G, first as fifth of C major, then as the third of E♭ major, and ultimately as the

tonic of G major. Although not as common as *Urlinie* descents to $\hat{2}$, static top voices in expositions, especially those from $\hat{5}$, do occur and presumably descend only in the recapitulation, yielding a type of sonata form without interruption. Ernst Oster's famous footnote in his translation of *Free Composition* (pp. 139–41) describes such a case.

What is particularly unusual about this sonata movement, however, is the structural function of its development. That is, instead of fulfilling its traditional and generically normal role as a zone of dominant prolongation (under a top-voice $\hat{5}$ or $\hat{2}$), the development in the op. 61 quartet articulates the entire melodic descent from $\hat{5}$ to $\hat{2}$ (see Example 5–10b). Top voices that complete some portion of their descent to $\hat{2}$ within the development are fairly common in the Classical era, especially in minor-mode works, as can be seen in Example 5–13.[20] Dvořák's articulation of the full descent within the development, on the other hand, is deformational according to Classical norms. It is through this kind of structural innovation that Dvořák pushed sonata form beyond its Classical boundaries.

How does Dvořák highlight this descent? How does he make it obvious, especially to a stylistically attuned connoisseur of the late 1800s who would not have expected it? To answer these questions, I appeal to Schenker's concept of *obligate Lage*, the obligatory register. In *Free Composition*, he writes that

> [n]o matter how far the composing-out may depart from its basic register in ascending or descending linear progressions, arpeggiations, or couplings, it nevertheless retains an urge to return to that register….Such departure and return creates content, displays the instrument, and lends coherence to the whole.

[20] A representative example of this type of structure is the first movement of Mozart's Piano Sonata in C Minor, K. 457.

> The principle of obligatory register applies not only to the upper but also to the lower voice….Nevertheless the final tone of the fundamental line sometimes appears an octave lower or an octave higher than the obligatory register would require.[21]

How is one to know which registers in Dvořák's op. 61 are obligatory for the outer voices? There is never a question that C major is the tonality and that G is the *Kopfton* (see P^1 in Example 5–10a). The basic register of the bass voice is the C2 octave—C2 being the lowest note on the cello—and is established as early as m. 9. I believe, however, that the basic register of the upper voice in which the tonal drama will unfold is not fully established until m. 24. To my hearing, the first twenty-three measures have the character of an extended upbeat; the restlessness of the rhythmic ostinato coupled with the stasis of the pedal point after m. 9 and the dynamic swell from *pianissimo* give the whole opening section a feeling of tense anticipation. Measures 20–23, in particular, with the standing on the dominant, increased rhythmic activity, and *crescendo* to *fortissimo* dramatize the tonic arrival at m. 24 (labeled P^2 in Example 5–10a). It is at precisely this dramatic moment that G6 is first heard.

If the C6 octave is accepted as the obligatory register of the *Urlinie*, established by the G6 of m. 24, then it is precisely that octave where structural articulation should be sought. I have already demonstrated that the top voice of the exposition is fundamentally static. This reading is supported by the rarity of the C6 octave in the second half of the exposition; only once is there even an echo of the top-voice G6—in m. 98, within the C-zone—which can be understood as a reminder of the obligatory register. The development, on the other hand, is rife with activity in the C6 octave, as can be seen in Example 5–10b. Though G6 is not often

[21] Schenker, *Free Composition*, §268, 107.

literally present, there is no question that the music retains an urge to return there. Before I trace the course of the upper voice, however, the harmonic shape of the development must be considered.

A prolongation of E—both major and minor—takes up a large portion of the development, despite the fact that E itself is only minimally tonicized. The bass note E first arrives as the dominant of A minor just after the double bar. Next, E is heard as the tonicized minor V of A minor (m. 116), as the second statement in a sequence, or perhaps like a real answer in a fugal exposition. When E major is heard at m. 135, its harmonic function is again that of a local dominant of A minor. This dwelling on the diatonic iii (or chromatic III♯) can be heard as a modal counterbalance to the ♭III that began the S-zone and a further development in the dyadic conflict between E and E♭ that was initiated in m. 3 by the common-tone half-diminished seventh. Tonal implications this chord, A–C–E♭–G, play out within the development in other ways as well. The developmental P-theme is first heard in A minor, and the E that is prolonged through most of the development functions locally as the dominant of A. The composing-out of chord's the three upper notes of this chord, C–E♭–G, has been heard throughout the exposition as P (C) and S (E♭ → G). The development completes this process by using A minor as the first key. Like the first movement of the String Quartet in E♭ Major, op. 51—whose expositional keys, E♭–G–B♭–D, were an outgrowth of the opening major-seventh chord of its first measure—important keys in the op. 61 quartet derive mostly from the tonal conflicts presented in m. 3. Large-scale formal generation from a salient germinal motive at or

near the beginning of a work is an important large-scale strategy that appears in many of Dvořák's mature works.[22]

Although the harmonization of the *Urlinie* in the development is unorthodox, its melodic logic can be followed with relative ease; large swaths of music are anchored by sequential processes. The *Kopfton* G6 is re-attained in m. 116 over E minor and the following ascent from an inner-voice B5 to F♯6 through an ascending 5–6 sequence represents a step down to a lower neighbor note at a deeper level (see Example 5–10b). Because of the sequential falling thirds (descending 5–6) in mm. 129–35, stepwise motion in the top voice at the middleground level is not maintained, though stepwise motion in the bass is. Measures 135–43 are again a realization of an ascending 5–6 sequence, this time with cast-out roots, while Corelli-like reachings-over characterize the melodic ascent. A final sequential passage in mm. 143–51 leads to A6, the upper neighbor of the *Kopfton* G6. This sequence ascends in consecutive minor thirds (shown by the asterisks in Example 5–10b). Unlike the earlier sequences, this one is not rooted in eighteenth-century harmonic processes; it is a real sequence, a nineteenth-century technique described by Gregory Proctor as the "transposition operation."[23] This passage does not fit easily into a Schenkerian paradigm because it does not prolong either of the diminished chords that it arpeggiates—D♯–F♯–A in the soprano, G♯–B–D–F in the bass.

From the upper neighbor A6, incomplete at the deepest level, the music descends in parallel tenths with the bass through G6 to F♮6 ($\hat{4}$) at m. 154. E6 ($\hat{3}$) is heard first as the fifth of an A^7 harmony in m. 161, then as the ninth of an applied V^9 of G in m. 162, and finally as a brief

[22] For this reason, analysts of Dvořák's music will often be rewarded by remembering Schoenberg's well-known admonition to pay close attention to the first nondiatonic note in a piece of tonal music. In this vein, refer to the above discussion of the Piano Trio in F Minor, op. 65, in which the first key of the development, B major, is related to the first chromatic note of the P-theme, B♮.

[23] Gregory Proctor, *Technical Bases of Nineteenth-century Chromatic Tonality*. The sequence is real despite the change of chordal inversion at the second and third asterisks.

suspension over the dominant in m. 163 before resolving to D6 ($\hat{2}$).[24] Once D6 has entered, the musical texture thins dramatically, as if on cue—an aural signal of the interruption—before the reintroduction of G6 via a chromatic ascent.

That the entire descent of the *Urlinie*'s first branch takes place within the development does not put this piece at odds with a Schenkerian analytical paradigm. Indeed, it was Schenker himself who wrote that "the development section is above all a path, determined by the structural division, which must be traversed."[25] In this case, Dvořák uses the development as a registrally highlighted modal corrective of the exposition, whose potential realizations of the *Urlinie* would have included $\flat\hat{3}$; that is, the descent of the *Urlinie* to the interruption follows a strictly diatonic path in C major.[26] Thus, despite its atypical location within sonata-space and its somewhat unusual harmonic support, the diatonic *Urlinie* in Dvořák's op. 61 is less deformational at the deepest level than a modally mixed one would have been.

The exposition and development taken together form the first branch of the fundamental structure; the middleground voice leading shows us exactly how and where this branch descends to the point of interruption. In this instance, the voice leading shows us how the two sections connect despite the sectional boundary delimited by the end of the exposition. The recapitulation and coda stand in an analogous relationship to the exposition and development. That is, the

---

[24] Though it may seem weakly articulated compared to the $\hat{4}$ and $\hat{2}$ that surround it, this $\hat{3}$ still possesses enough harmonic support to exist at prior structural levels. See David Beach, "The Cadential Six-Four as Support for Scale-Degree Three of the Fundamental Line," *Journal of Music Theory* 34 no. 1 (Spring 1990), 81–99. See also Allen Cadwallader, "More on Scale Degree Three and the Cadential Six-Four," *Journal of Music Theory* 36, no. 1 (Spring 1992), 187–198, in which he writes that "scale-degree 3 in a $\hat{5}$-line has a dual nature: it is the third of the horizontalized tonic triad, and it embodies the qualities of a *passing tone*. Schenker did, of course, view the fundamental line first as a linear expression of tonic harmony…" (188). He goes on to discuss various instantiations of Schenker's concept of the unsupported stretch (*Leerlauf*), especially those that delineate $\hat{4}$–$\hat{3}$–$\hat{2}$.

[25] Schenker, §316, 139. See also §314, 136–37.

[26] *Urlinien* and their associated *Ursätze* are most often diatonic; some pieces, however, contain chromatically inflected top voices at the deepest levels of their structure.

second branch of the fundamental structure, which contains the final descent of the *Urlinie*, does not fully unfurl until the coda-space. As such, the final formal sections of this quartet are linked by the voice-leading structure over the sectional boundary marked by an ESC-substitute.

The recapitulation begins with P^2 (the analog of m. 24) and reestablishes the *Kopfton*, G6; the omission of P^1 seems to support my appraisal of mm. 1–23 as an extended upbeat. A "developmental pocket" ushers in an initially surprising arrival of the P^1-theme in A major; retrospective hearing, however, allows us to understand this counterstatement of the absent P^1-theme as the beginning of the recapitulatory TR (compare m. 47 in the exposition, where the P-based TR begins).[27] While functioning at the middleground level as VI of C major (or perhaps a large-scale V/ii), lingering on A major generates another associative reference to the common-tone half-diminished seventh chord of m. 3 (and, by extension, to the A-minor P-statement that began the development). TR terminates in a I:HC MC in m. 225. What Dvořák's transposition facilitates is a descent from $\hat{5}$ to $\hat{3}$ (see Example 5–10c). The MC-point in the exposition had been an upper-neighbor tone to G (though A♭ was the local $\hat{4}$ in E♭ major, the key in which S began). Upon its recapitulatory transposition, however, the MC-point is able to support the articulation of $\hat{4}$ of the *Urlinie*. Subsequently, the top voice of the S-zone in the recapitulation is $\hat{3}$. The recapitulatory second group, comprising both S- and C-zones, is harmonically analogous to the exposition. Much as the exposition moved from E♭ major to G major in its second half, the second half of the recapitulation starts in C major and moves a major third upward to E major, where it cadences. In Hepokoski and Darcy's terms, the recapitulation is nonresolving; m. 250 represents not the ESC (analogous to the EEC at m. 87) but an ESC-substitute.

[27] From the standpoint of rotational form, the absence of P^1 from the recapitulatory P-zone makes this a double-edged moment.

Ultimate melodic descent occurs in the coda (see Example 5–10d). Many writers have commented on the elevation of the coda to a structurally important space in the music of the later 1800s, integral to the excitement and drama of the piece as a whole.[28] Dvořák's P-based coda begins at m. 271 on a surprising six-four chord of D major (especially surprising in relation to the preceding E major). This chord turns out not to be cadential; it functions as a consonant six-four that arpeggiates downward to a root-position D-major chord in m. 271. The *pianississimo* reappearance of P^1 over a six-four chord, an almost supernatural effect, seemingly initiates one further rotation of the expositional *Anlage*. The move to D major immediately reverses the motion to the sharp side that had occurred at the rhetorical close of the recapitulation, eliminating two of the four sharps of E major. Robert Hatten has referred to the unexpected appearance of a six-four chord as an "arrival six-four chord" or even, in certain contexts, a "salvation six-four chord."[29] Although the latter of these two terms is generally reserved for a major six-four chord in an otherwise minor context, there is a certain salvific element in Dvořák's employment of the D-major six-four chord as well: its immediate appearance at a different tonal level than the prior section suggests the arrival of a *deus ex machina*, an effect that rescues the music from further sharp-side indiscretions.

The ultimate descent of the *Urlinie* is finally achieved near the end of the coda. At first it seems that this descent will occur in mm. 294–95 because the salient $\hat{3}$–$\hat{2}$–$\hat{1}$ motion in the first violin is accompanied by a *ritardando* and a fermata, rhetorical markers of closure. This melodic descent occurs over a pedal point, however, and is also in the "wrong" register. As

[28] For example, Joseph Kerman, "Notes on Beethoven's Codas," in *Beethoven Studies* 3, ed. by Alan Tyson (New York: Cambridge University Press, 1982), 141–60; also Peter Smith, *Expressive Forms in Brahms's Instrumental Music: Structure and Meaning in His Werther Quartet* (Bloomington, IN: Indiana University Press, 2005), esp. 76–91 and 206–210.
[29] Robert Hatten, *Musical Meaning in Beethoven*, 15.

such, I feel that this rhetorical PAC-moment is best understood as representing an inner-voice descent. Accordingly, it seems that another coda module begins (the coda to the coda) by surface design at m. 295, where reintroduced S-material overlaps with continuing P-material. The $\hat{3}$ of the structural line, already heard in the cello melody at m. 295, is regained by the first violin in mm. 299–300 over a cadential six-four chord. This chord is left before it can resolve to its five-three; thus, the A-minor harmony of m. 301 is not a deceptive resolution but the first of several interpolated chords between the cadential six-four and its resolution to a root-position dominant in m. 304. These interpolated chords not only highlight the ascent back to the obligatory register, they provide an associative harmonic link to the opening half-diminished seventh and the structural keys that it generated. The A-minor chord in mm. 301–302 recalls the beginning of the development, and the E-major chord of m. 303 recalls the key in which the ESC-substitute was heard. The G♯5 of this E-major chord is converted into A♭5 for the pre-dominant chord in the following measure. The decisive and final move return the tonic is made in m. 305, where the *Urlinie* closes in the obligatory register. The final seventeen measures concern themselves only with valedictory statements of P (colored by generically appropriate subdominant inflections).

The role of the coda as a structurally important space takes on additional meaning in light of the development's role as a structurally important space in this work. Whether or not by conscious design, Dvořák elevated these two spaces—spaces that had been structurally peripheral in the Classical era, especially in major-key sonata forms—to become active

participants in the unfolding of the fundamental structure of the piece, what Schenker called "das Drama des Ursatzes."[30]

Although I have spent almost all of my energies on the op. 61 quartet in this section describing voice-leading processes over formal boundaries, other clear instances can be found in earlier chapters, especially the discussion of nonresolving recapitulations on pp. 217–34. The pieces associated with this discussion—the op. 48 sextet (Example 3–29), the op. 81 piano quintet (especially Example 3–31), and the Ninth Symphony (especially Example 3–33d)—are directly related to the ideas presented in this section.

Conclusion.

The small sample of pieces in both sections of this chapter should not be seen as isolated instances of voice-leading examples. Rather, they are emblematic of the processes that are found in many of Dvořák's mature works, which I demonstrated through cross-references to examples from prior chapters. Those examples, while illustrating other issues in their various contexts, can be easily accommodated here. Finally, it should be noted that certain features of Dvořák's style consistently appear from the early to late works of his maturity. For example, the nonresolving recapitulation of the op. 48 sextet, written in 1878, has resonances with the nonresolving recapitulations of the op. 81 piano quintet (1885) and Ninth Symphony (1893). Further, the op. 51 quartet (1878) exhibits a large-scale composing-out of the "nationalistic" major seventh chord in the opening measures: the exposition's keys arpeggiate that seventh chord. This type of

[30] Schenker, §315, n. 14, 137 (translated by Oster as "drama of the fundamental structure"). See also Carl Schachter, "Structure as Foreground: 'das Drama des Ursatzes,'" in *Schenker Studies* 2, Carl Schachter and Hedi Siegel, eds., 298–314 (New York: Cambridge University Press, 1999).

procedure—the large-scale composing-out of a salient motivic kernel—can be found many later pieces such as the op. 61 quartet (1881), the op. 65 piano trio (1883), and the op. 87 piano quartet (1889). Further research will reveal whether or not such voice-leading techniques might apply to the operas or late tone poems. Given the consistency with which they are exploited in Dvořák's mature instrumental compositions, however, it might be expected that they would.

CONCLUSION.

The foregoing chapters have only scratched the surface of Dvořák's wide-ranging and inventive uses of harmony, form, and voice leading. As I hope to have demonstrated, he derived musical inspiration from the masterworks of the Viennese classicists, New German experiments in harmony and form, and, of course, the cultural patrimony of his Czech homeland. I also hope to have shown that—with the possible exception of his earliest works—these inspirations did not manifest themselves as slavish imitation. Indeed, Dvořák's best works exhibit a continual freshness, even upon repeated exposure. They abound in melodic, harmonic, and rhythmic vitality and ingenuity. One might say that a certain passage sounds more or less Wagnerian or Brahmsian, or that it exhibits certain aspects of Czech nationalism, but the authorial stamp of the work as a whole can only be that of Dvořák. Especially in the works of Dvořák's maturity, such as the Sixth and Seventh Symphonies or the Piano Quintet, the various inspirational elements often exist side by side in a wonderful stylistic synthesis.

In chapter 1, I sought to locate Dvořák's mature music stylistically within the context of nineteenth-century Romanticism. Beginning with the musical impact of composers such as Wagner, Smetana, Schubert, and Brahms, and continuing with a discussion of Dvořák's relationship to the folk music of his Czech homeland, the chapter presented what I hope is a reasonably complete picture of this context. In chapter 2, I was most concerned with Dvořák's participation in the ongoing development of nineteenth-century harmonic practice, a participation that I divided into three categories: enriched chromatic function, enriched diatonic function, and enriched cadential function. The first of these categories encompassed such concepts as juxtaposed third-related harmonies, voice leading between different types of seventh

chords, the concept of *Mehrdeutigkeit*, and chromatically foreign sonorities derived through voice leading. The second category included Dvořák's employment of modal practices, such as emphasis on secondary triads in a key (e.g., iii and vi), pentatonicism, and non-standard diatonic sonorities through voice leading. The last category included Dvořák's expansion of cadential function through his use of leading-tone substitutions by the submediant and subtonic scale degrees, the concomitant use of subdominant or minor-dominant harmonies in support of such substitutes, and the accumulation of notes above $\hat{5}$. Through his multivalent, often overlapping realizations of concepts within this tripartite categorization, I hope to have shown just how richly creative Dvořák's musical imagination was.

In Part II, I was most concerned with showing how Dvořák pushed Classical sonata form beyond its traditional boundaries, with special attention to structural joins such as the medial caesura and points of essential expositional closure or essential sonata closure. Important here was the way that Dvořák often blurred traditional boundaries—a symptom of the larger nineteenth-century predilection for continuous textures—often employing new strategies to avoid overly punctuated sectional divisions. In chapter 4, I argued that Dvořák's structural experimentation often closely resembles that of Brahms. I undertook to show the nature of their musical relationship more clearly than prior scholars have done, especially with regard to when and in what way Brahms's influence became operative.

Lastly, in Part III, I showed how some of Dvořák's most interesting devices can be found at the middleground level of voice leading, a domain not entirely covered under the rubrics of harmony or form. For Dvořák's mature work, this middleground level is perhaps the area in which the most analytical work remains to be done. For my part, I focused primary attention on the String Quartet in C Major, op. 61, which is not as well-known as his later quartets (but

perhaps should be). Of special importance was the relation of the first chromatic chord of the piece, a common-tone half-diminished seventh, to key areas later in the piece. In this and other mature works, Dvořák often problematizes a chord or motive early in a sonata-form work, often as part of the opening P-theme. The working-out of such tonal problems is usually apparent in the relation of keys at deep levels and is often important at middleground levels of articulation as well.

The popularity of Dvořák's music has never waned among concert audiences. It is rare for a symphony orchestra to go a season without performing at least one of his works and his music is a staple of classical radio stations.[31] Indeed, a few of his pieces, like the Ninth Symphony, have attained a kind of crossover popularity that is comparable to that of works such as Beethoven's Fifth and Ninth Symphonies and Mozart's *Eine kleine Nachtmusik*. This concert-hall popularity has not transferred as readily to the domain of music theory, which is still largely concerned with the music of Austro-German composers, especially where the later nineteenth century is concerned.[32] Although this exclusive interest in Austro-German repertoire in the music-theory community is waning, the study of Austro-German music will remain important for the simple reason that many of the great composers of the late nineteenth century *were* German or Austrian. As an Austrian subject and a resident of Prague, Dvořák was close both geographically and culturally to Vienna, the putative center of this mainstream of European art

[31] One instance of this continued popularity among concert audiences was the success of the Chicago Symphony Orchestra's three-week festival of Dvořák's music in 2009.

[32] The indebtedness of American musicians and theorists to German performers and pedagogues is a recurring theme in Joseph Horowitz's *Classical Music in America* (New York: W. W. Norton, 2005). David W. Bernstein's chapter "Nineteenth-century Harmonic Theory: the Austro-German Legacy," in *The Cambridge History of Western Music Theory*, ed. Thomas Christensen (New York: Cambridge University Press, 2002), 778–811, is similar in tracing the mainstream of late nineteenth-century music-theoretical thought to German-speaking lands.

music; yet to a significant degree he also retained his independence from it. This duality offers ripe ground for musicological and music-theoretical research.

The richness of content in Dvořák's music, and the way that it intersects with the musical expression of his Classical forebears on the one hand and his contemporaries and countrymen on the other, will continue to pay handsome dividends to those who choose to study it. It is my hope that this dissertation has made inroads along these lines, and—with the writings of Beckerman, Beveridge, Burghauser, Clapham, and Döge, among others—that it will help to inspire further research into Dvořák's music, carried out with due respect for its contexts, its originality, and its enduring quality.

Appendix A: Index of works discussed

Because of the topical nature of this dissertation, I have examined several of Dvořák's works in various levels of detail across multiple chapters, making the sustained consideration of just one piece difficult for the reader. As a remedy, this appendix contains a list of those works of Dvořák's maturity with which I have dealt in this study to some degree. That is, works to which I have made only a passing reference and/or have no associated musical or graphical examples are not listed in this appendix.

Beginning with the Piano Trio in G Minor, op. 26, the list is arranged in chronological order. Under each entry the following information is listed: its opus number, its Burghauser catalog number, its date(s) of composition (if known),[1] any pages that contain pertinent prose discussion (information presented in a footnote is indicated by an italicized *n*), and any musical or graphical examples of the entry, with page number(s) in parentheses.

1876 Piano Trio in G Minor, op. 26, B. 54; January 20.
35, 156, 169–72, 208–211
Examples 3–1 (150); 3–25 (211)

String Quartet in E Major, op. 80, B.57; February 4.
163–64, 193–97, 203*n*, 247*n*
Examples 3–1 (153); 3–3 (164); 3–19 (194)

1877 String Quartet in D Minor, op. 34, B. 75; December 18.
55*n*, 166–67, 168, 197–201, 212, 215, 244–48, 267, 284
Examples 3–1 (153); 3–5 (167); 3–20 (198); 3–21a (200); 3–21b (201)

[1] For dates of completion, I have mostly followed Clapham, *Antonín Dvořák, Musician and Craftsman*, 320–325 but deferred to the later scholarship of Döge when there are discrepancies.

[2] Dvořák's symphonic version of the Slavonic Dances (orchestrated April–August) is listed as B. 83.

1881 String Quartet in C Major, op. 61, B. 121; November 10.
54–57, 81–84, 92, 126, 128–34, 173–75, 203*n*, 218, 226–30, 246–47, 263*n*, 267–68, 270–77, 277*n*, 284, 285–301, 303
Examples 1–16a (56); 1–17a (57); 2–10 (82); 2–11 (83); 2–29 (129); 2–30 (130); 2–32 (132); 2–33 (134); 3–1 (154); 3–9 (175); 3–32 (227–28); 5–1 (273); 5–2 (273); 5–3 (274); 5–4 (275); 5–10a–d (287–90); 5–12 (292)

1883 Piano Trio in F Minor, op. 65, B. 130; February 4–May (?).
38, 92–93, 173–75, 268, 280–84, 302
Examples 2–17 (93); 3–1 (154); 3–9b (175); 5–8 (281); 5–9 (283)

1884–85 Symphony no. 7 in D Minor, op. 70, B. 141; Dec. 13, 1884–Mar. 17, 1885.
1, 20–27, 38, 40, 96–97, 134–35, 176
Examples 1–5 (21); 1–6 (23); 1–7 (24); 1–8 (25); 1–9a (27); 2–18d (96); 2–34 (135); 3–1 (154); 3–10 (176)

1886 Slavonic Dances (piano four hands version), second series, op. 72, B. 145; July 9.[3]
32, 42–43, 94–95
Example 2–18a (95)

1887 Terzetto, op. 74, B. 148; January 14.
119–120, 124
Example 2–16a (120)

Drobnosti (Minatures), op. 75a, B. 149; January 18 (?), arranged as Romantic Pieces, op. 75b, B. 150; January 25.
40, 105–06
Example 2–21 (106)

Piano Quintet in A Major, op. 81, B. 155; August 18–October 3.
1, 60–62, 183, 217, 218, 220–26, 230, 231, 247*n*, 301
Examples 1–19a (61); 3–1 (154); 3–30 (223); 3–31 (224–25)

[3] Like the first set of Slavonic Dances, which had a separate Burghauser number, the orchestration of the second series (completed Jan. 5, 1887) is listed as B. 147.

Appendix B: Scores and links to selected first movements of Dvořák's works.

Scores in the public domain are often without measure numbers or are misnumbered according to current-day practices. The scores included below have all been marked with correct measure numbers where necessary. Anacruses are not counted as full measures. First and second endings are counted with the same number (where numbers under the second ending sign labeled "bis"). Hyperlinks are included on the next page for scores of public-domain works mentioned in the body of the dissertation but not included in this appendix.

Links to public-domain scores on IMSLP

Symphony no. 6 in D Major, op. 60:

http://javanese.imslp.info/files/imglnks/usimg/1/1e/IMSLP54065-PMLP05728-Dvořák_op.060_Sinfonie_Nr.6_1.Allegro_non_tanto_fs_SNKLHU_3_6.pdf 14

NB: The numbering in the second ending is not analogous to the first ending, resulting in measure numbers that are all too high by fourteen after m. 177.

Piano Trio in F Minor, op. 65:

http://petrucci.mus.auth.gr/imglnks/usimg/4/4b/IMSLP147413-PMLP83168-Dvořák_op.065_Piano_Trio_No.3_Supraphon_ps.pdf

NB: The anacrusis is counted as a measure, so all measure numbers in the first movement are too high by one.

Symphony no. 7 in D Minor, op. 70:

http://erato.uvt.nl/files/imglnks/usimg/8/8a/IMSLP54069-PMLP05729-Dvořák_op.070_Sinfonie_Nr.7_1.Allegro_maestoso_fs_SNKLHU_3_7.pdf

Piano Quartet in E♭ Major, op. 87:

http://conquest.imslp.info/files/imglnks/usimg/9/94/IMSLP40235-PMLP88149-Dvořák_op.087_Piano_Quartet_No.2_Simr.pdf

NB: Unnumbered score

Symphony no. 8 in G Major, op. 88:

http://javanese.imslp.info/files/imglnks/usimg/3/32/IMSLP54076-PMLP08825-Dvořák_op.088_Sinfonie_Nr.8_1.Allegro_con_brio_fs_SNKLHU_3_8.pdf

Symphony no. 9 in E Minor, op. 95, “From the New World”:

http://javanese.imslp.info/files/imglnks/usimg/5/51/IMSLP54080-PMLP08710-Dvořák_op.095_Sinfonie_Nr.9_1.Adagio_Allegro_molto_fs_SNKLHU_3_9.pdf

NB: The numbering in the second ending is not analogous to the first ending, resulting in measure numbers that are all too high by four after m. 177.

TRIO

SOL MINORE

I

4. I. 1876

ANTONÍN DVOŘÁK, op. 26.
(1841 - 1904)

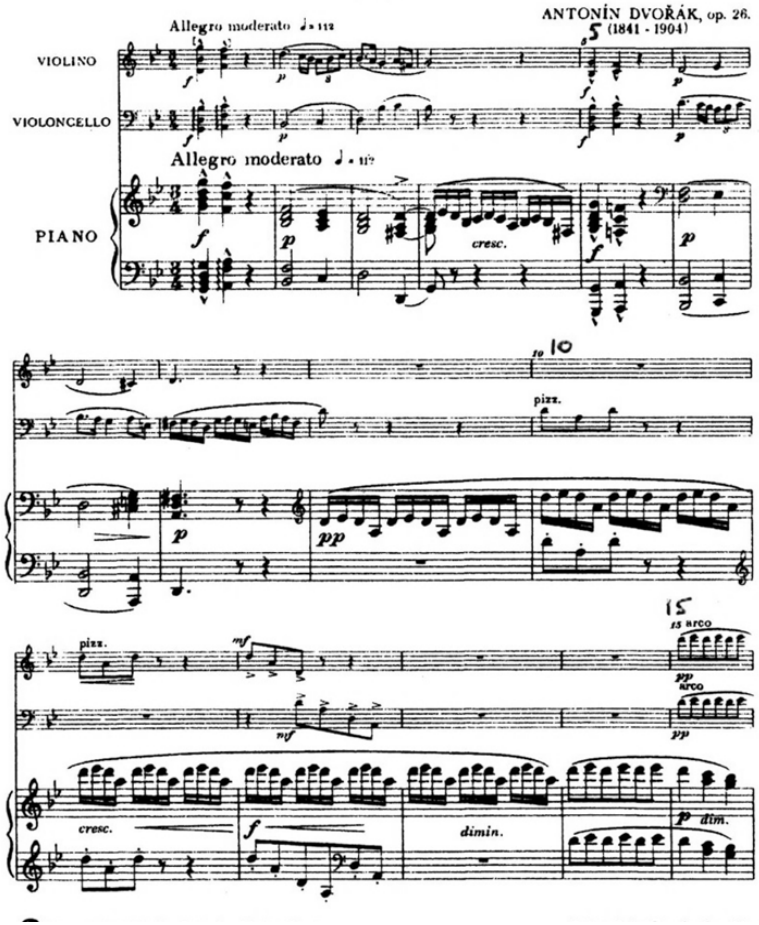
Allegro moderato ♩ = 112

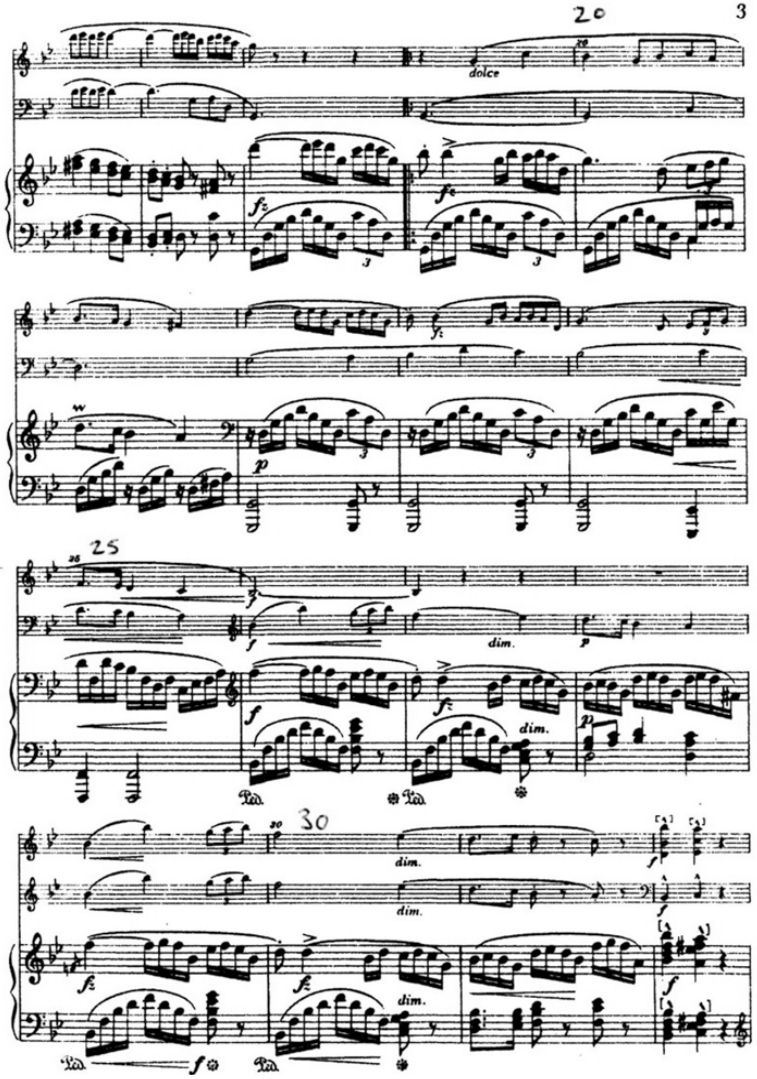
VIOLINO

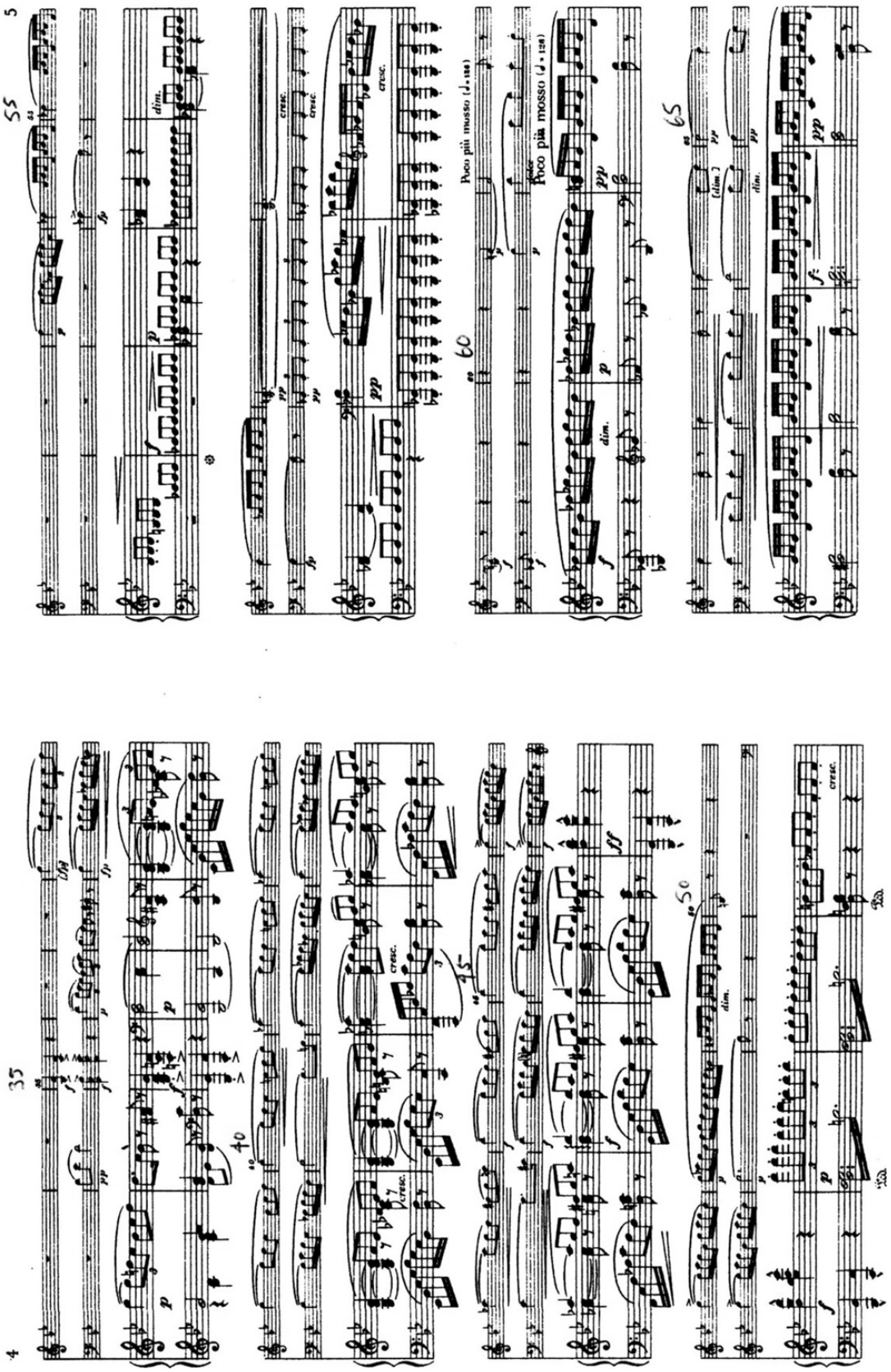
VIOLONCELLO

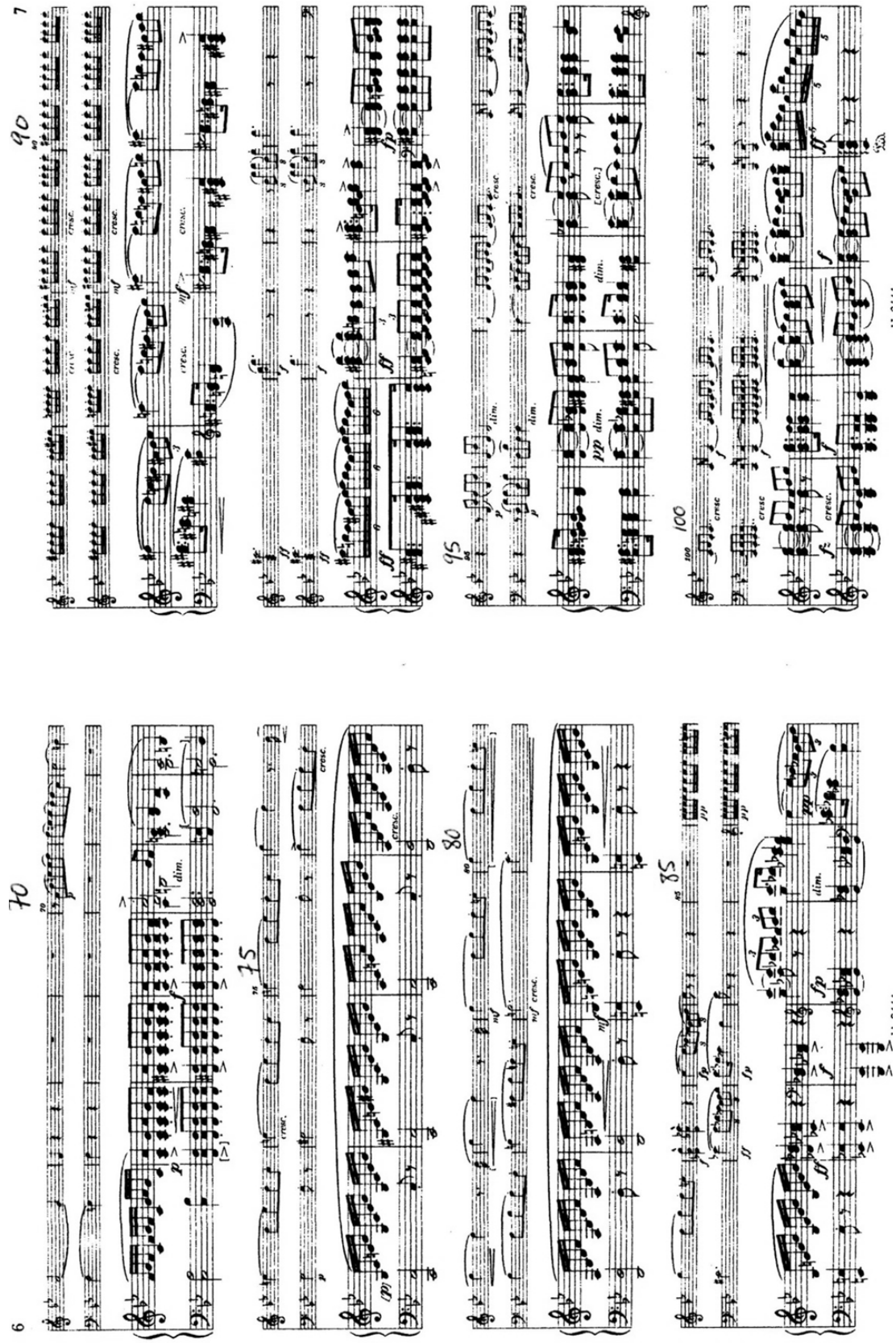
Allegro moderato ♩ = 112

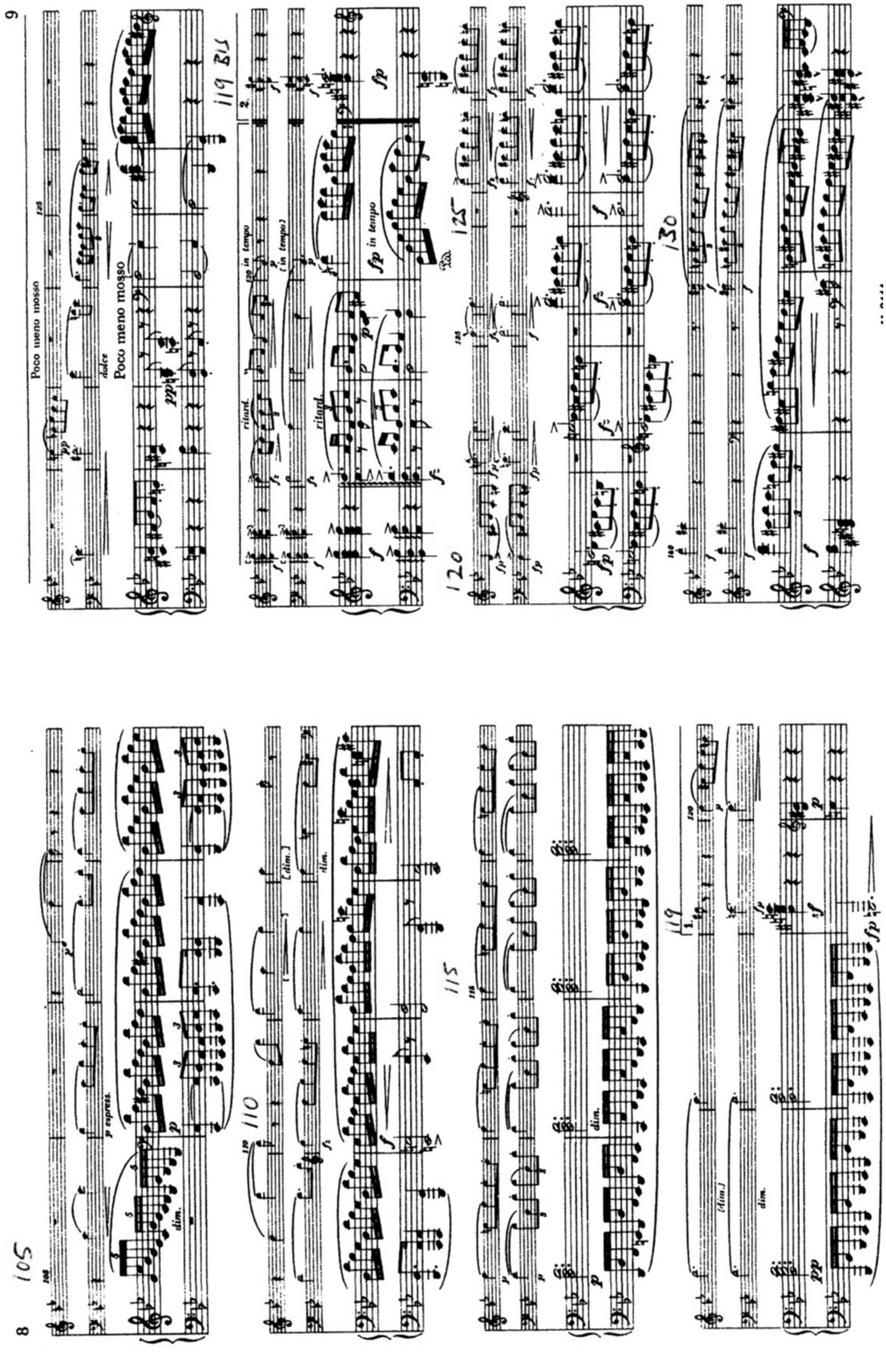
PIANO

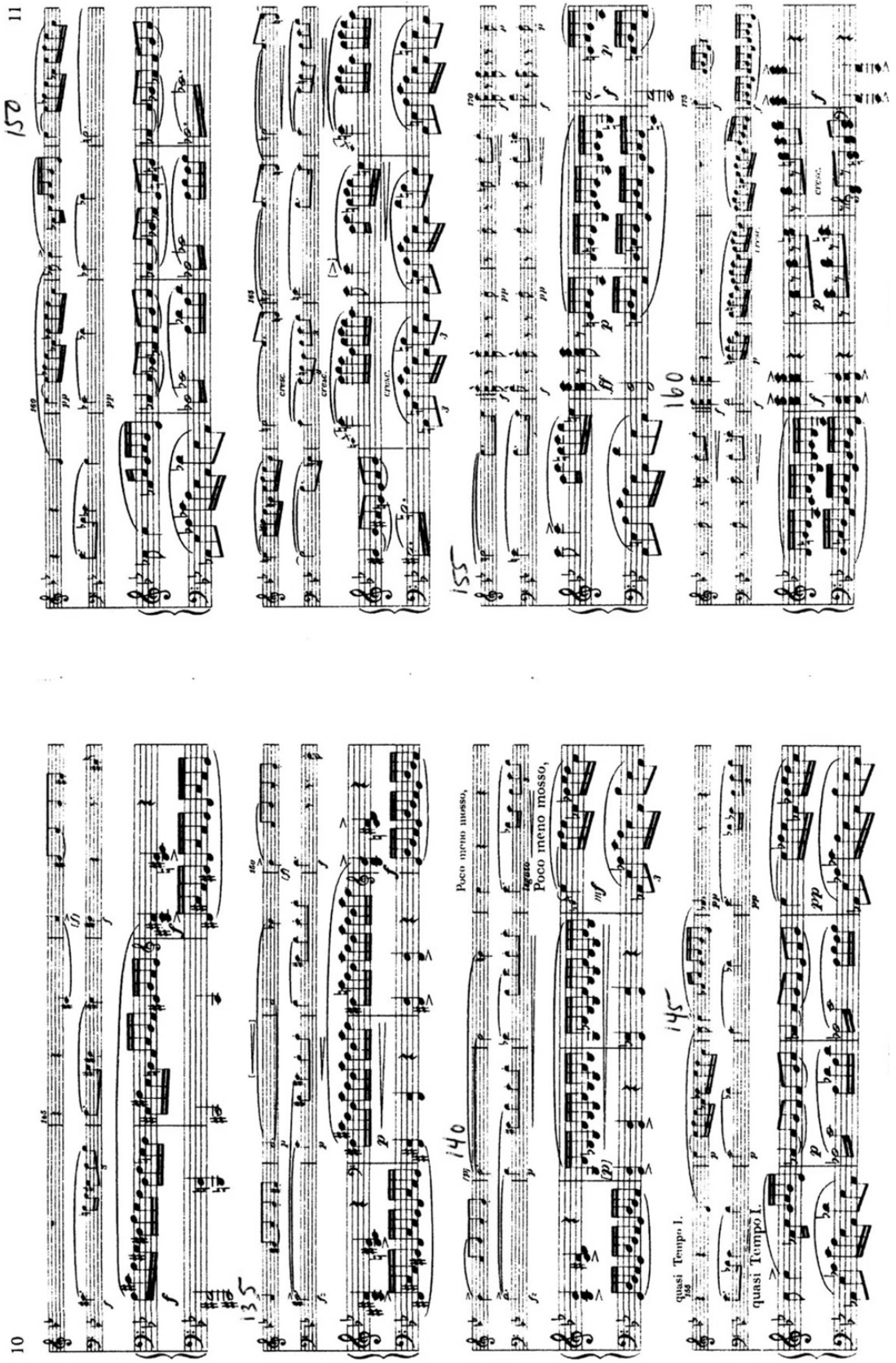


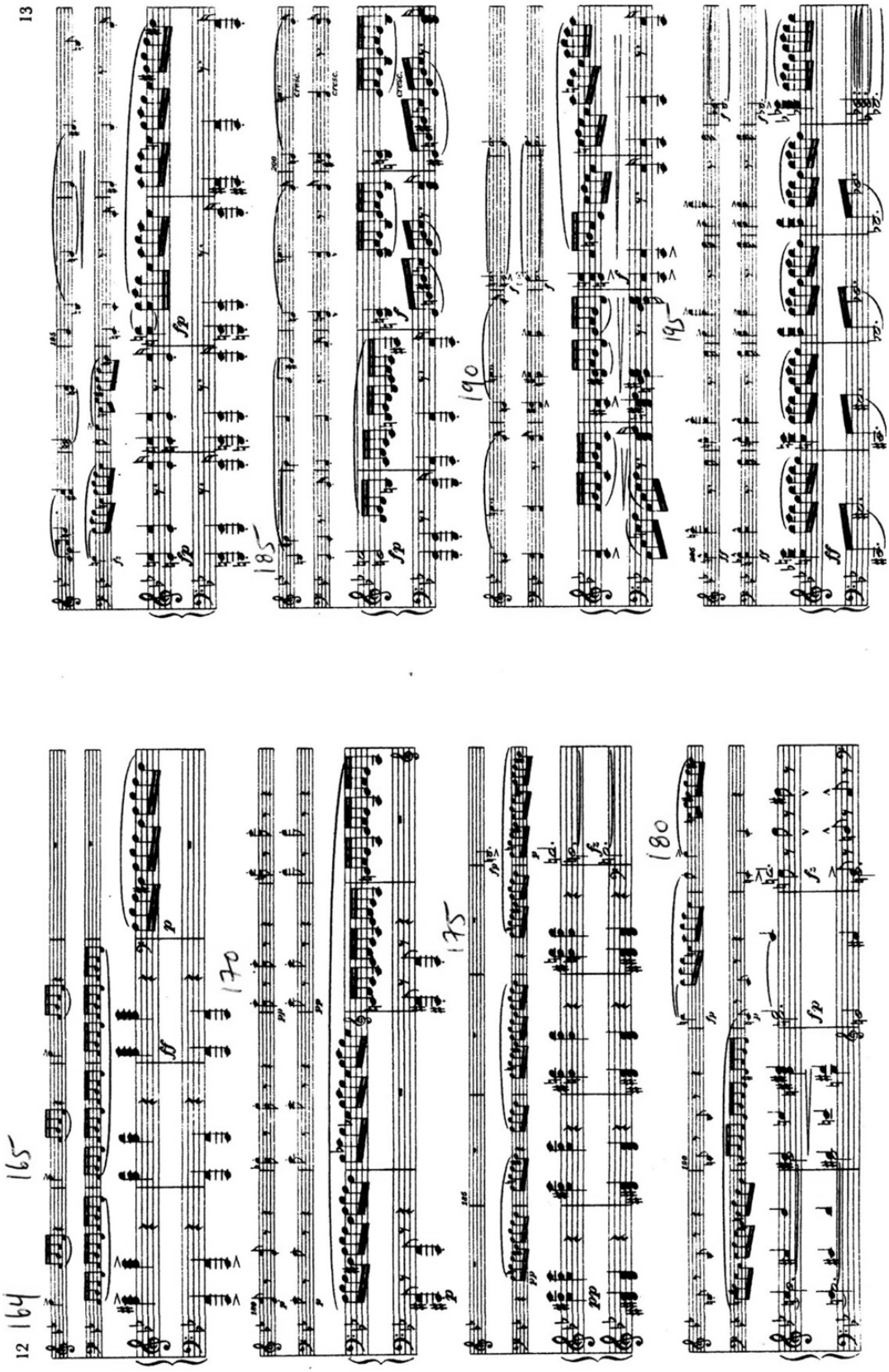


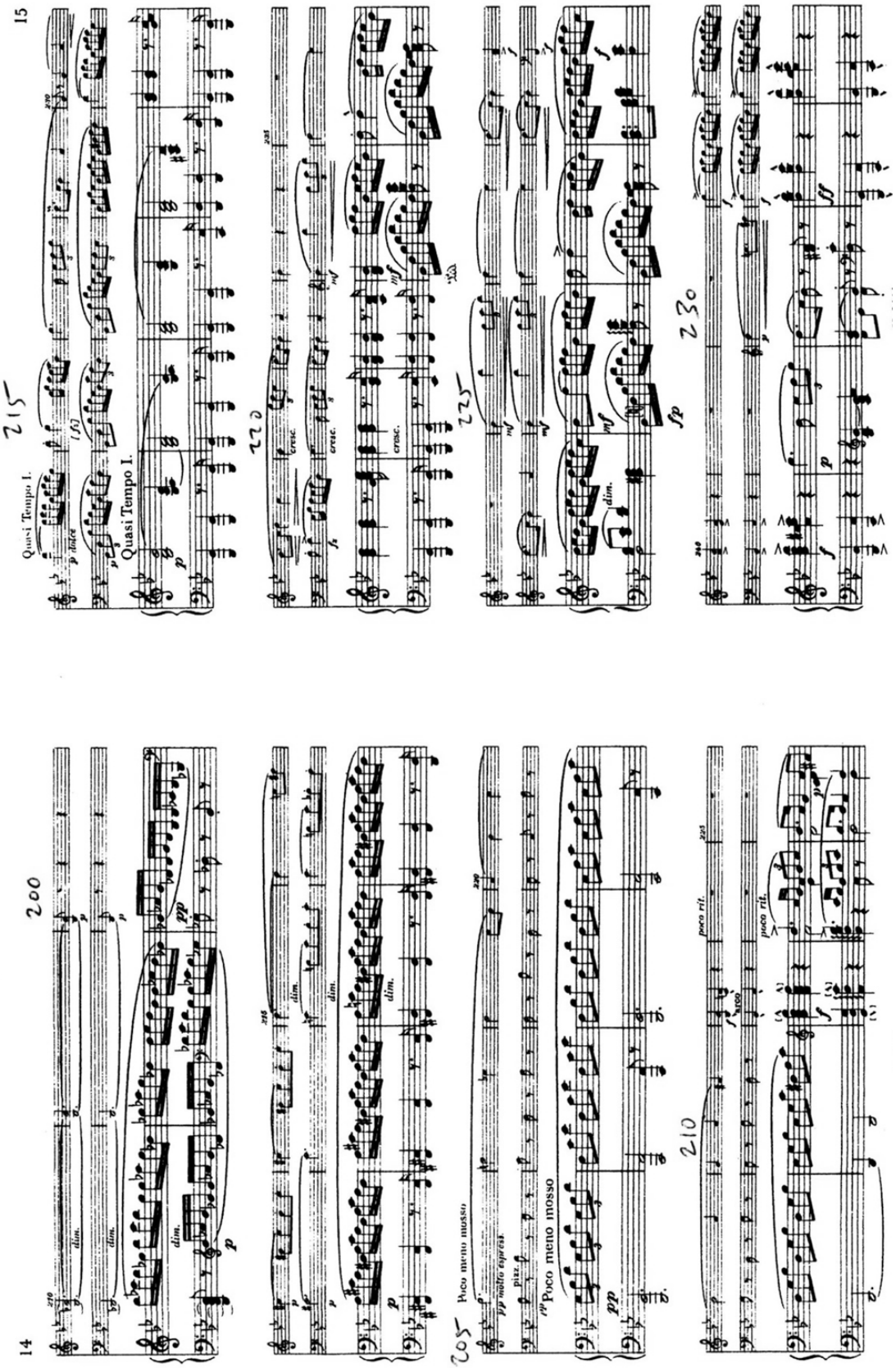

Poco più mosso (♩= 108)
Poco più mosso (♩= 120)

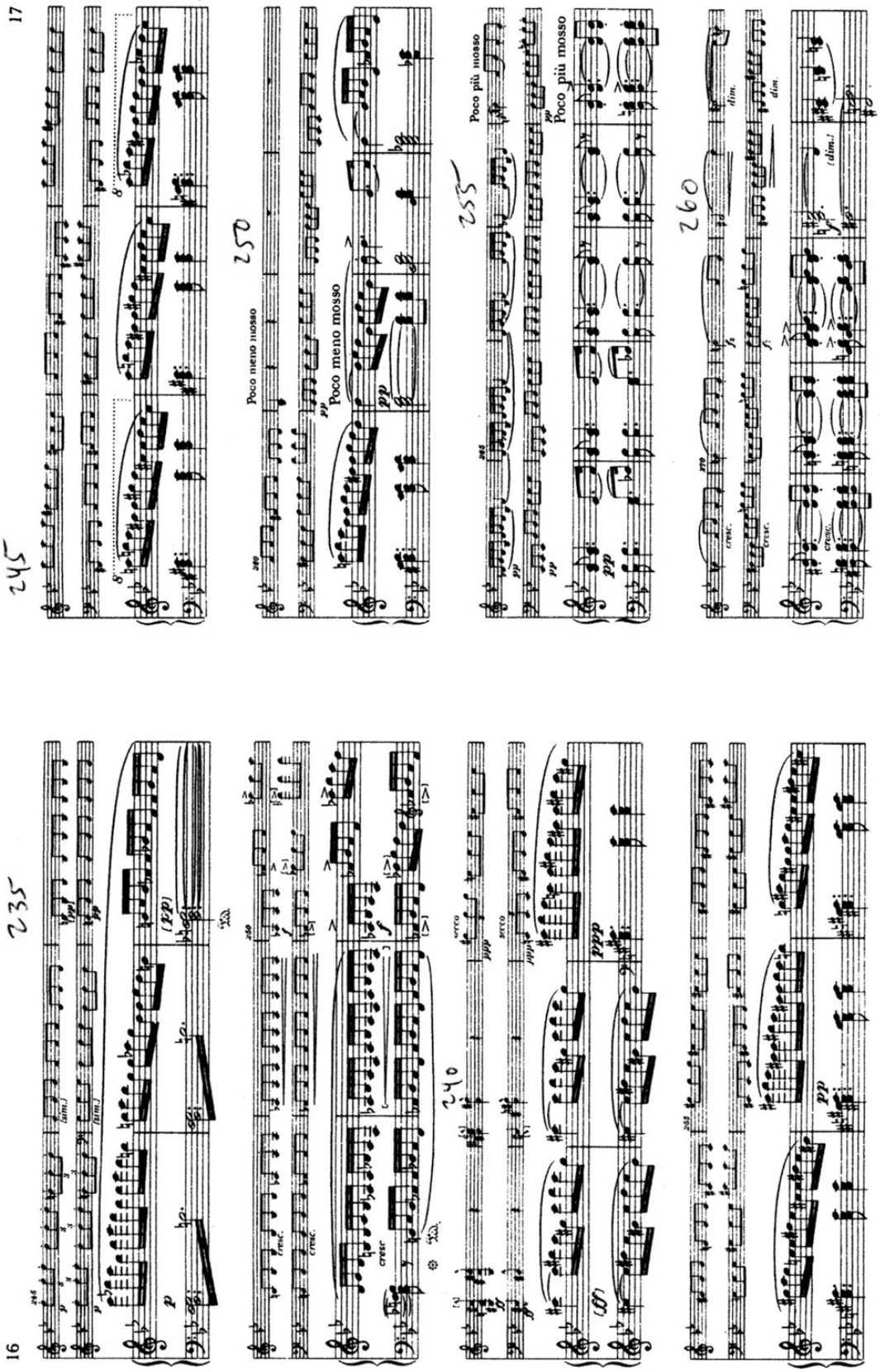


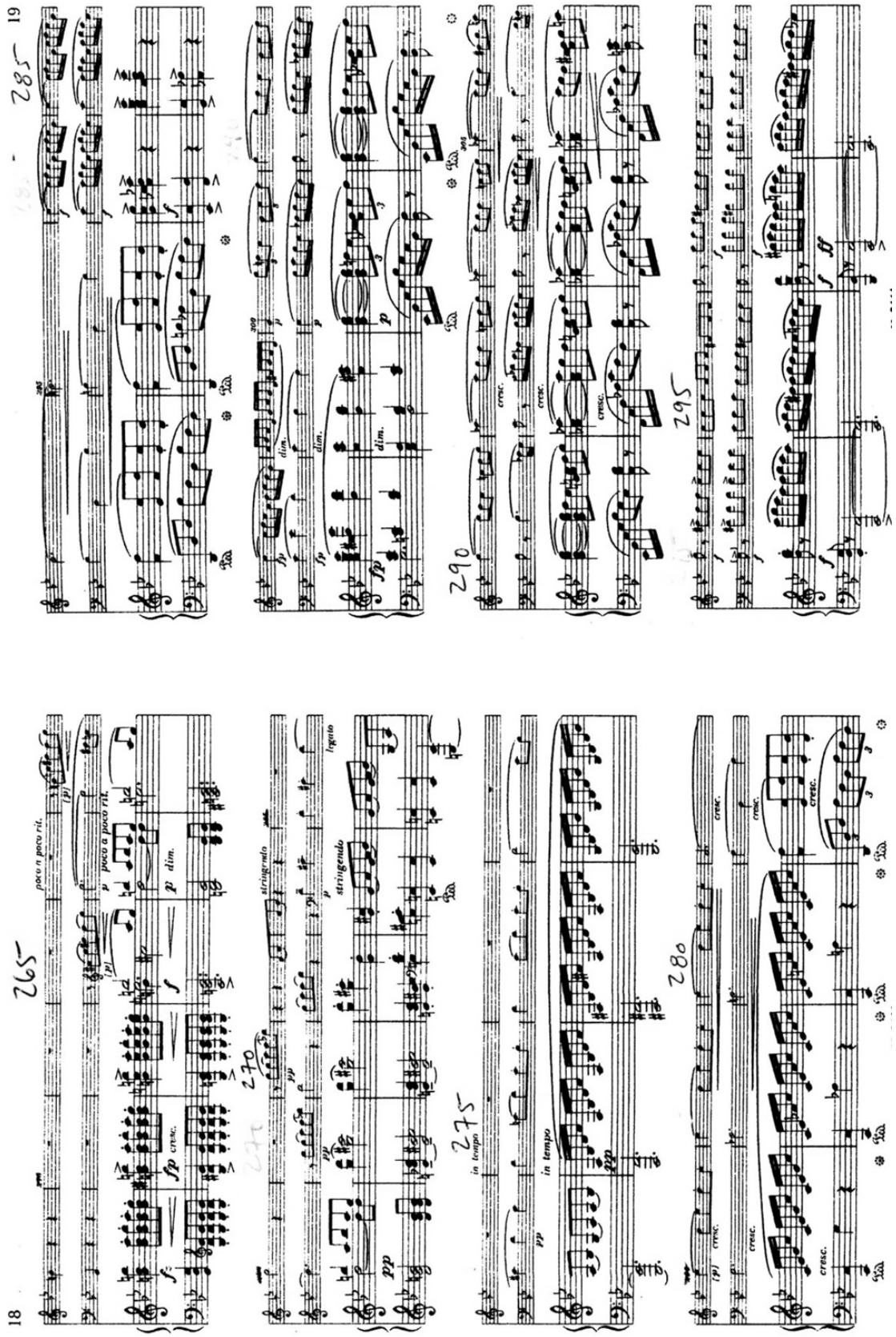

8
105
p express.
dim.
110
[dim.]
115
119
9
Poco meno mosso
dolce
Poco meno mosso
119 BIS
ritard.
in tempo
120
fp in tempo
125
130

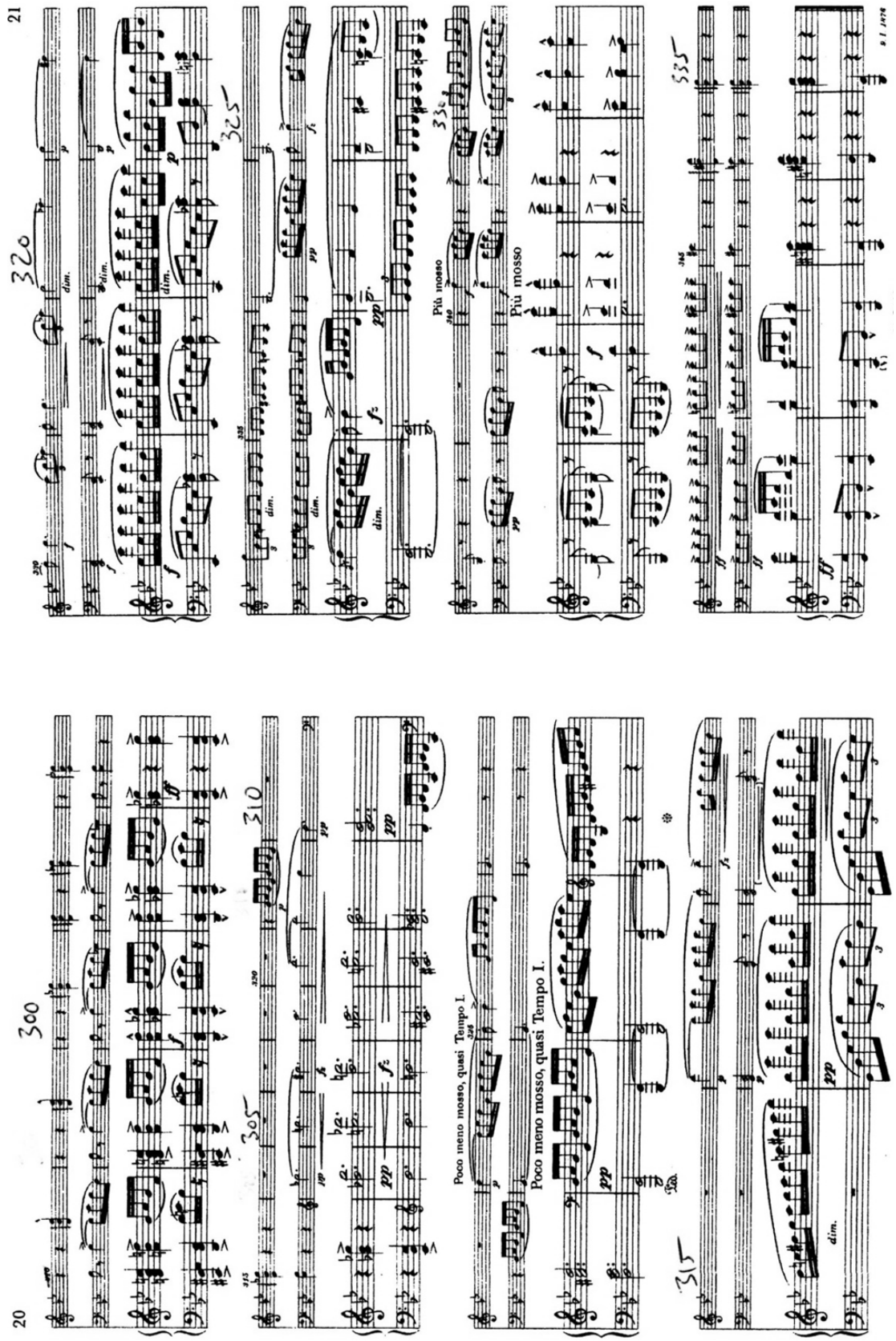

10
11
Poco meno mosso,
quasi Tempo I.
135
140
145
150
155
160


12
164
165
170
175
180
13
185
190
195


14
15
200
205
210
215
220
225
230
Quasi Tempo I.
Quasi Tempo I.
Poco meno mosso
Poco meno mosso
poco rit.
poco rit.


16
235
240
17
245
250
Poco meno mosso
255
Poco più mosso
260


18
19
265
270
275
280
285
290
295
poco a poco rit.
stringendo
in tempo
cresc.
dim.

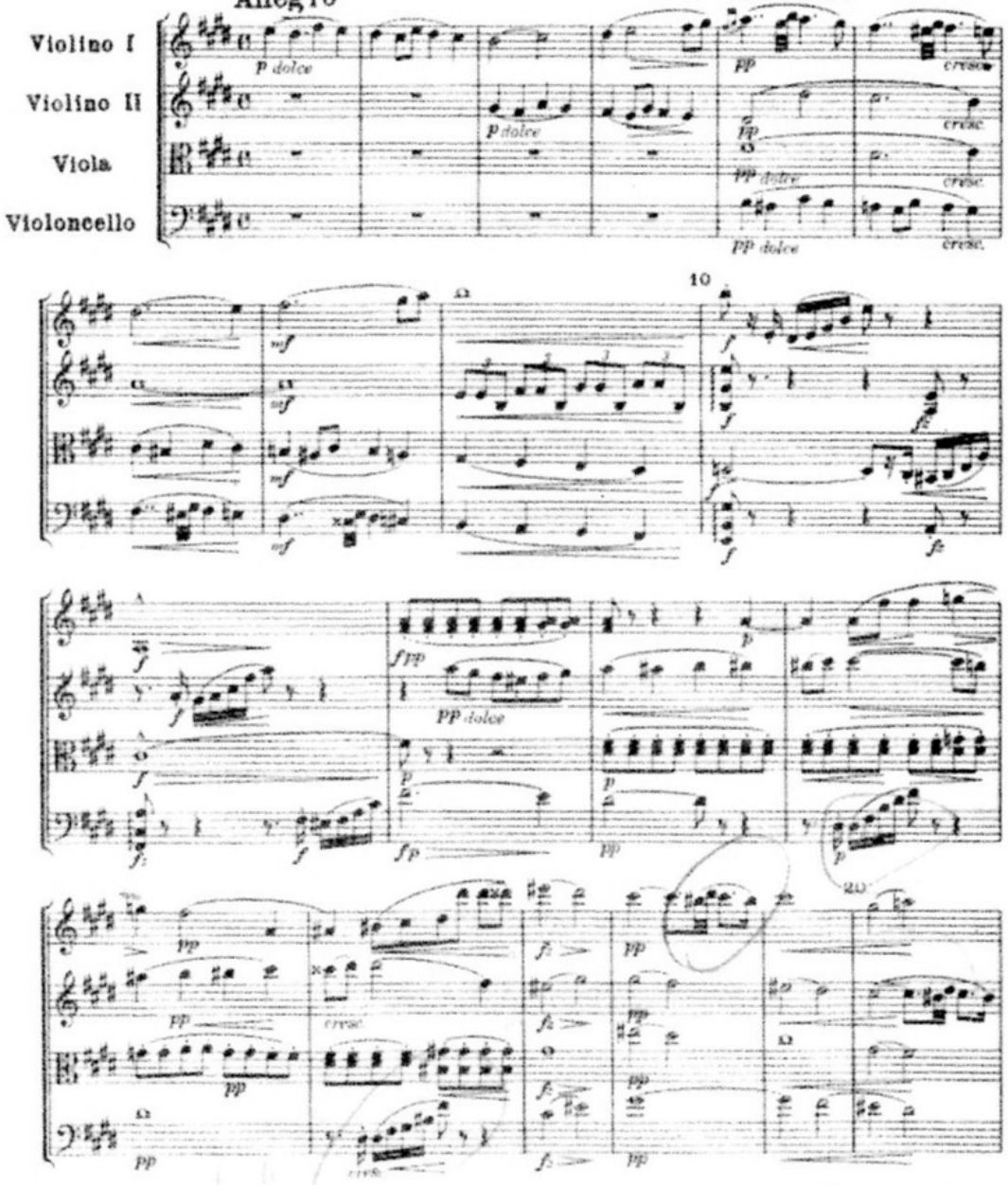

20
21
300
305
310
315
320
325
330
335
340
345
Poco meno mosso, quasi Tempo I.
Più mosso

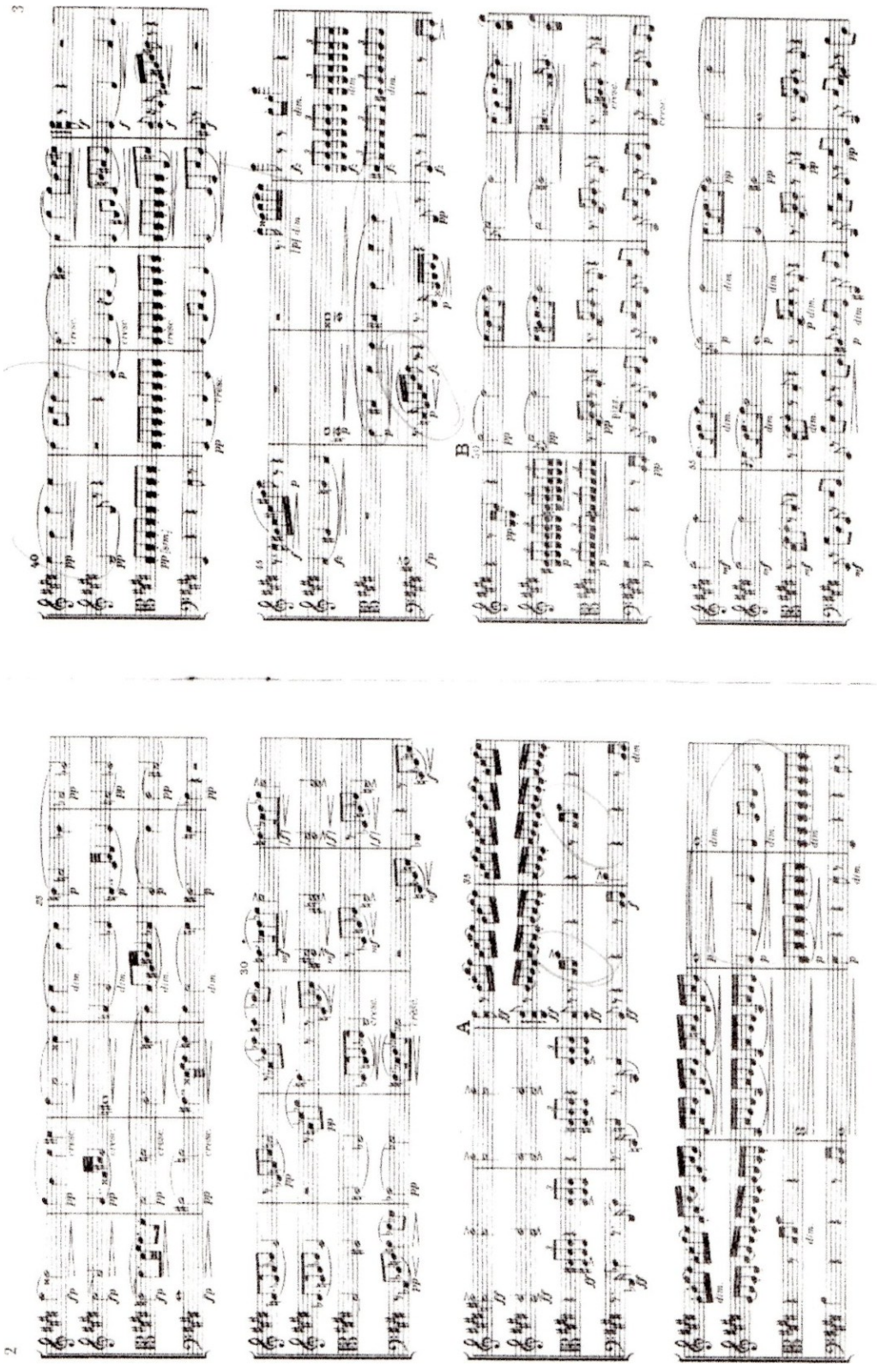
QUARTET

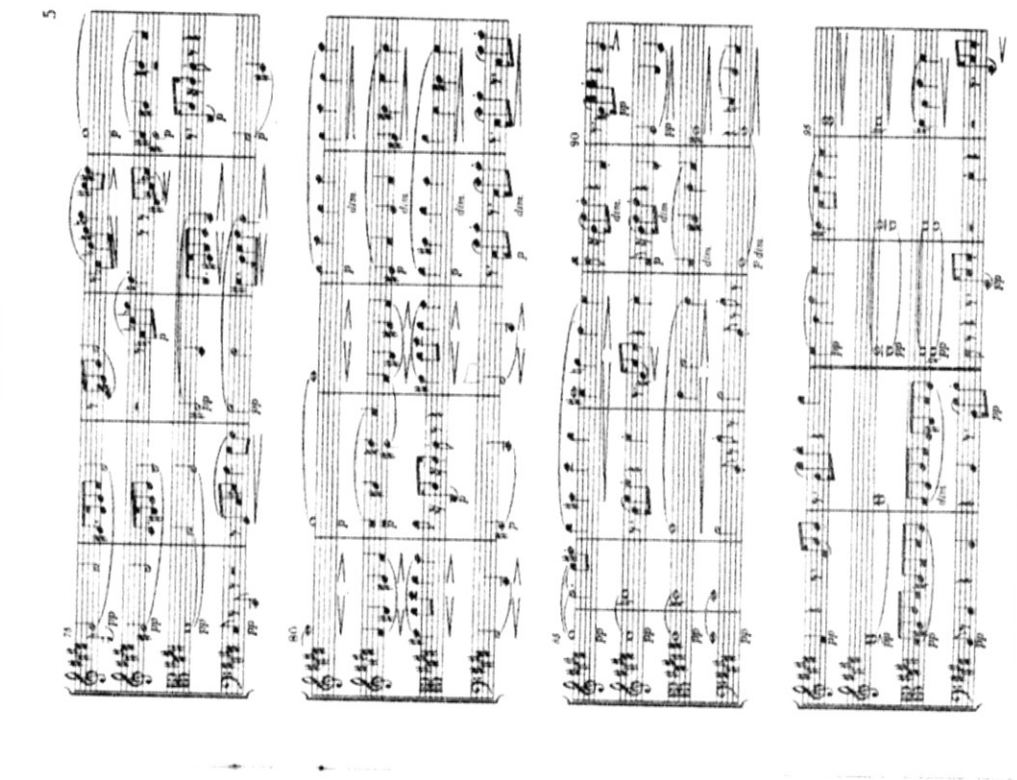
I.

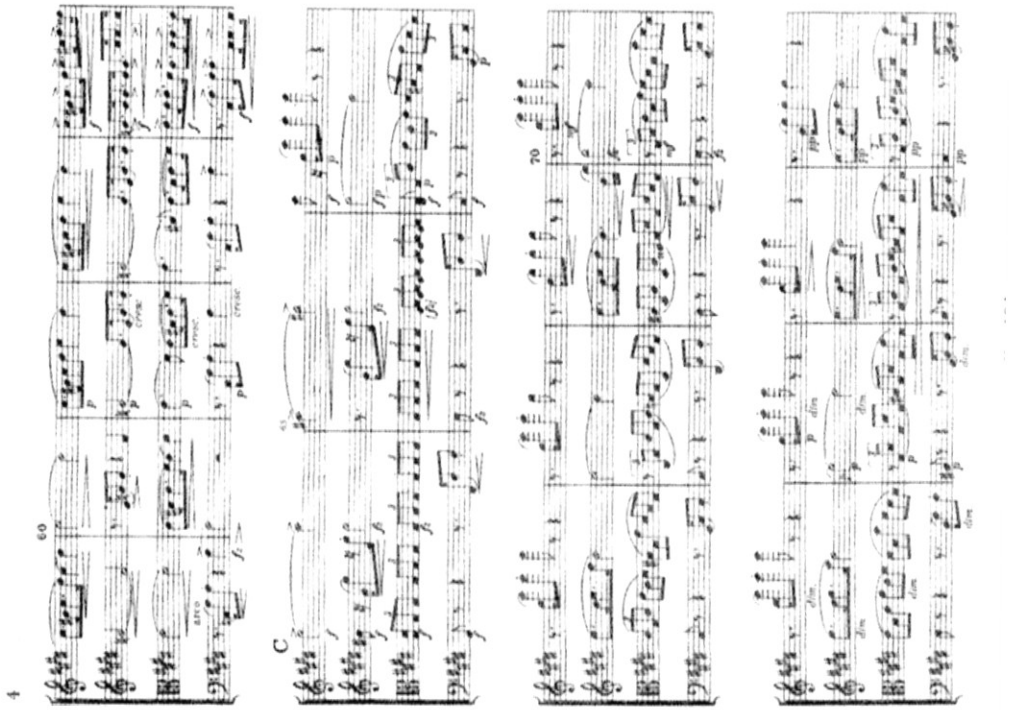
Antonin Dvořák, Op. 80
1841 - 1904

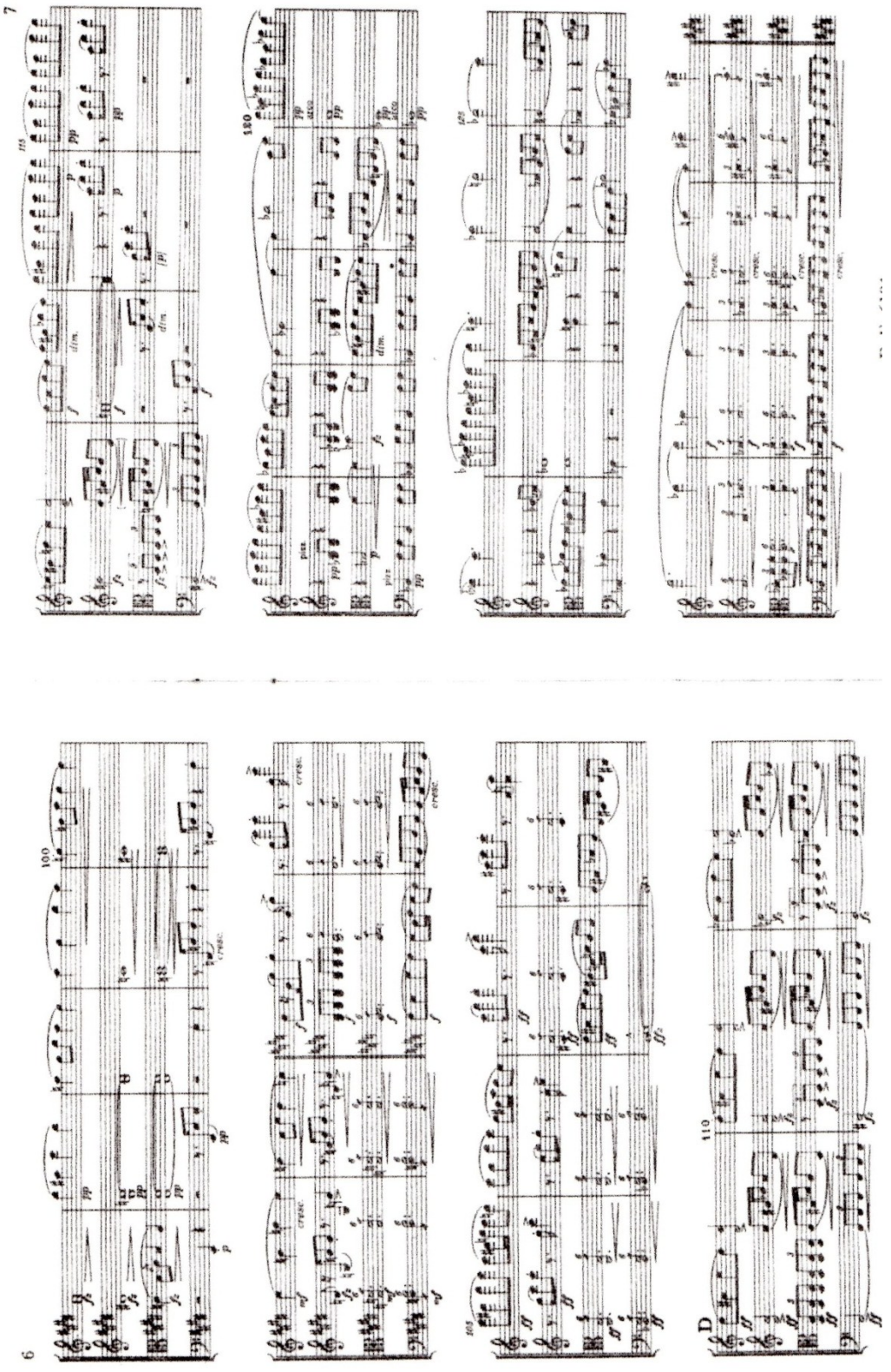
Allegro

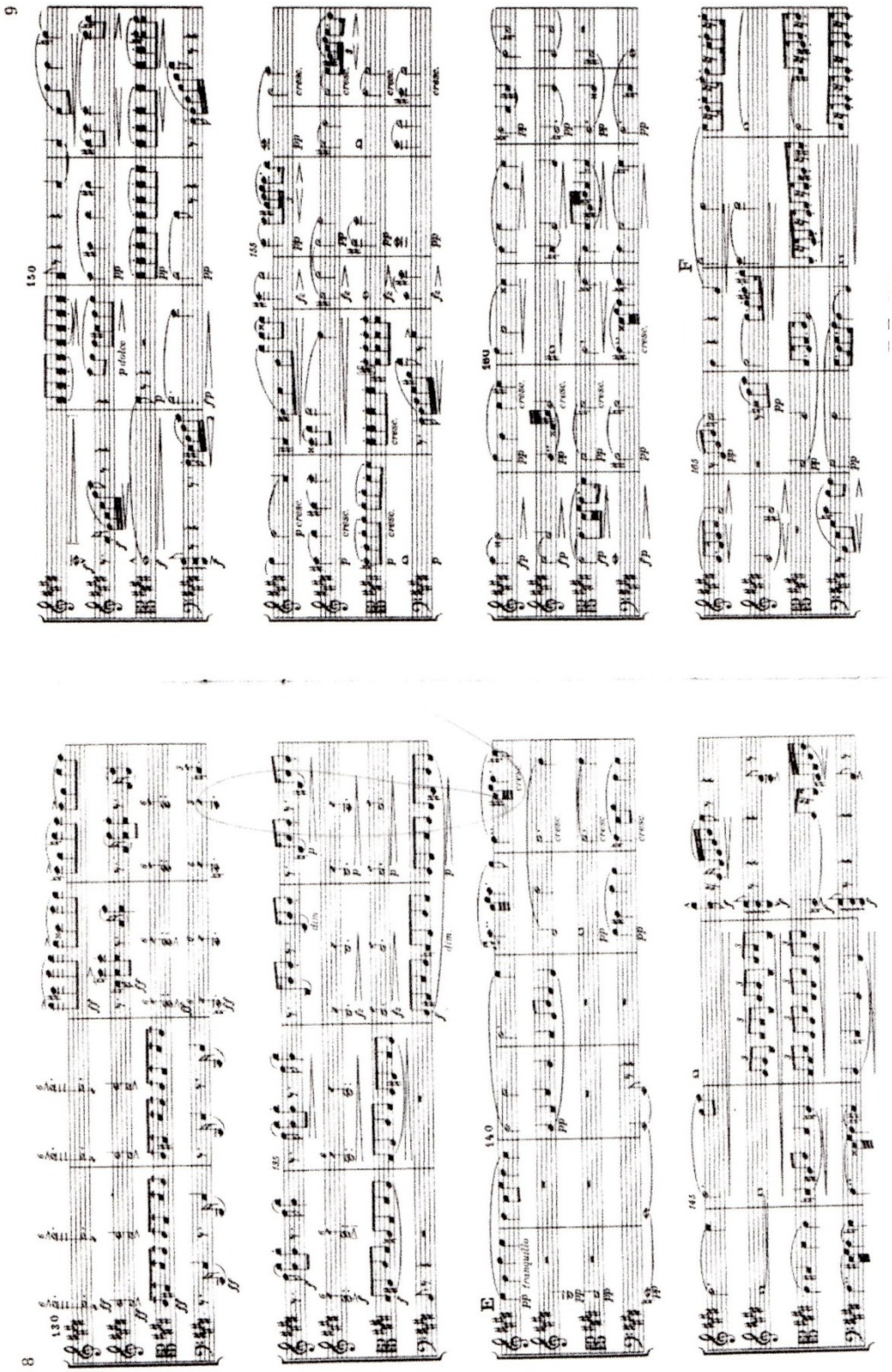


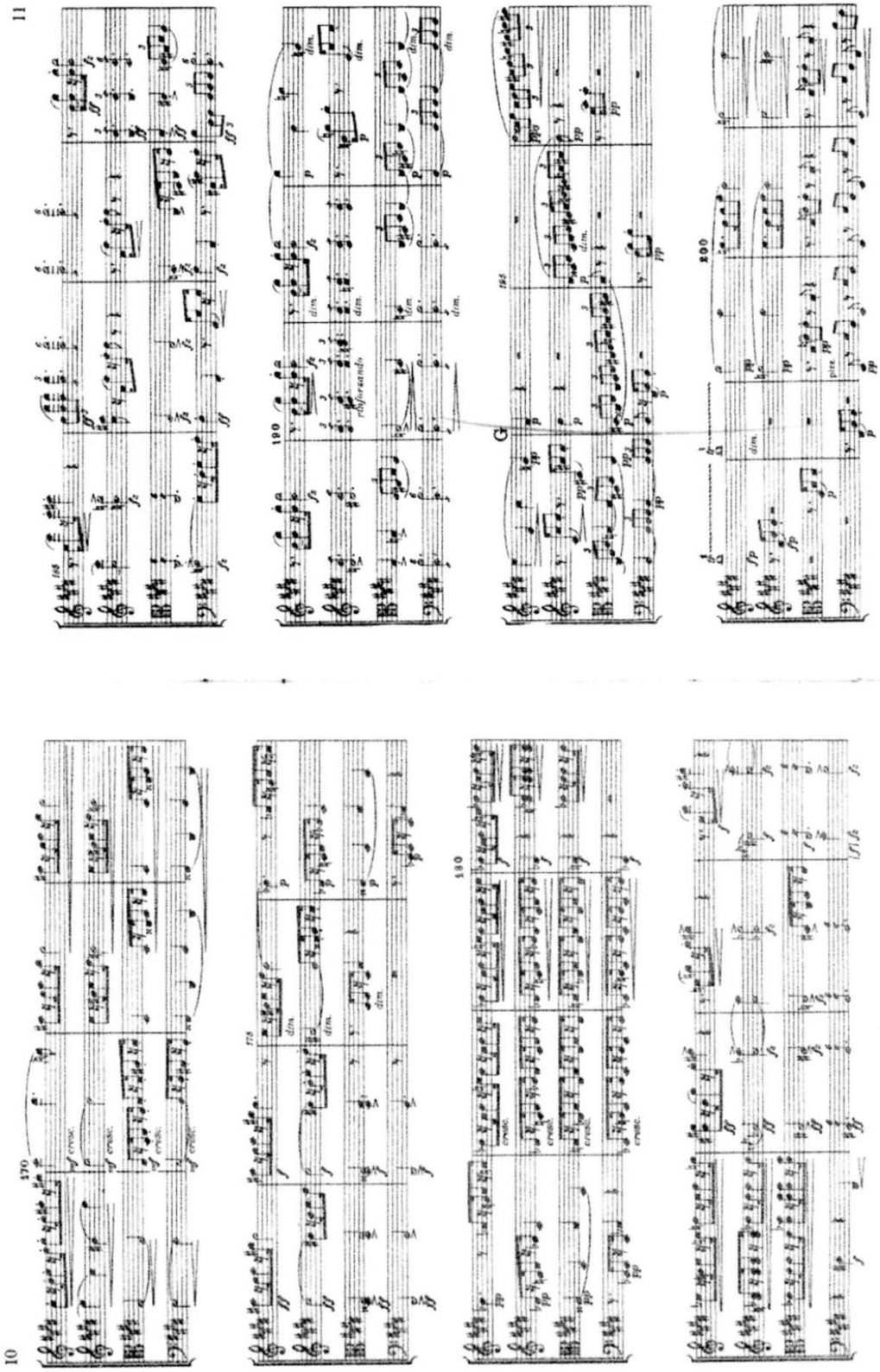


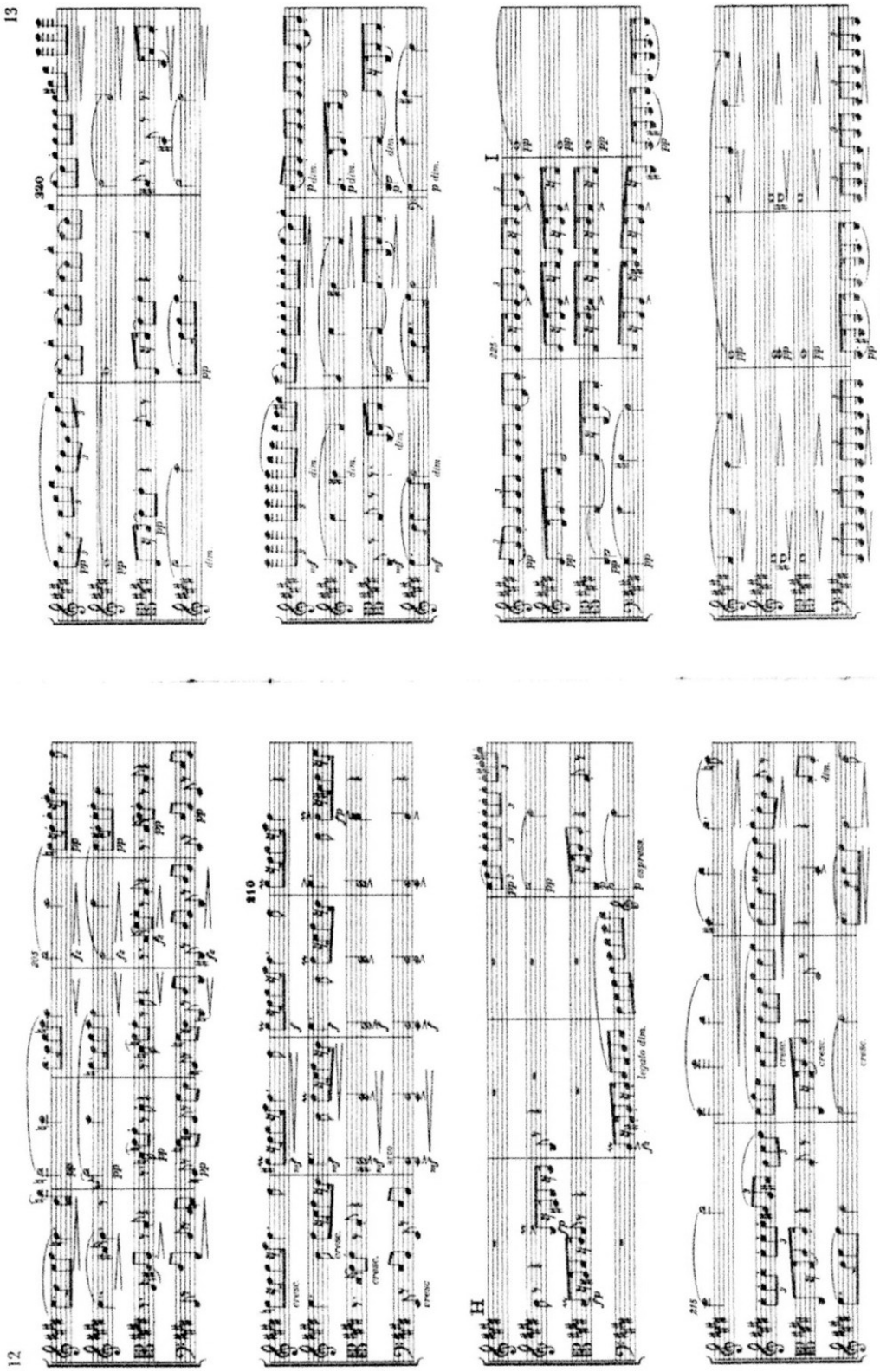


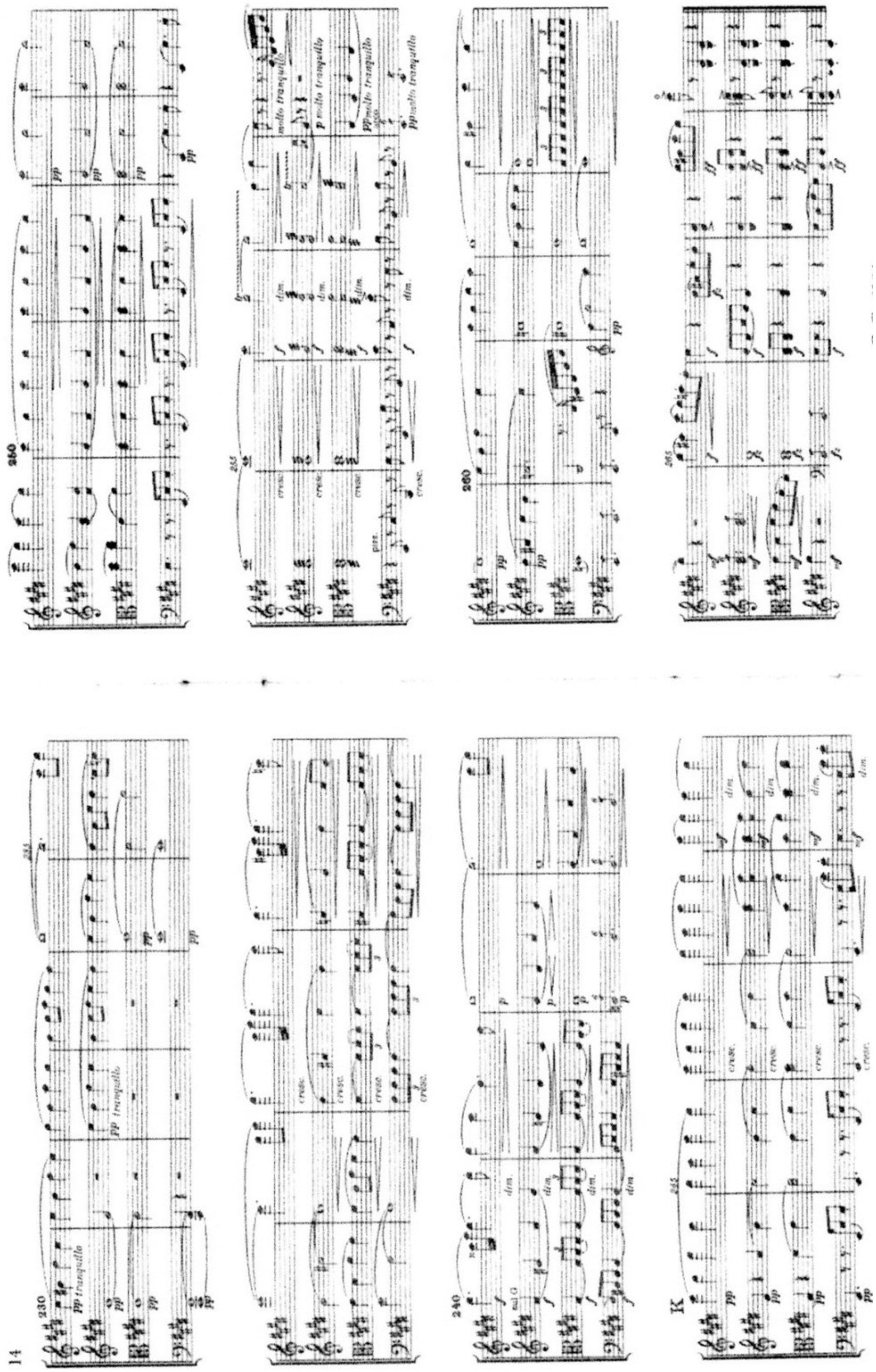






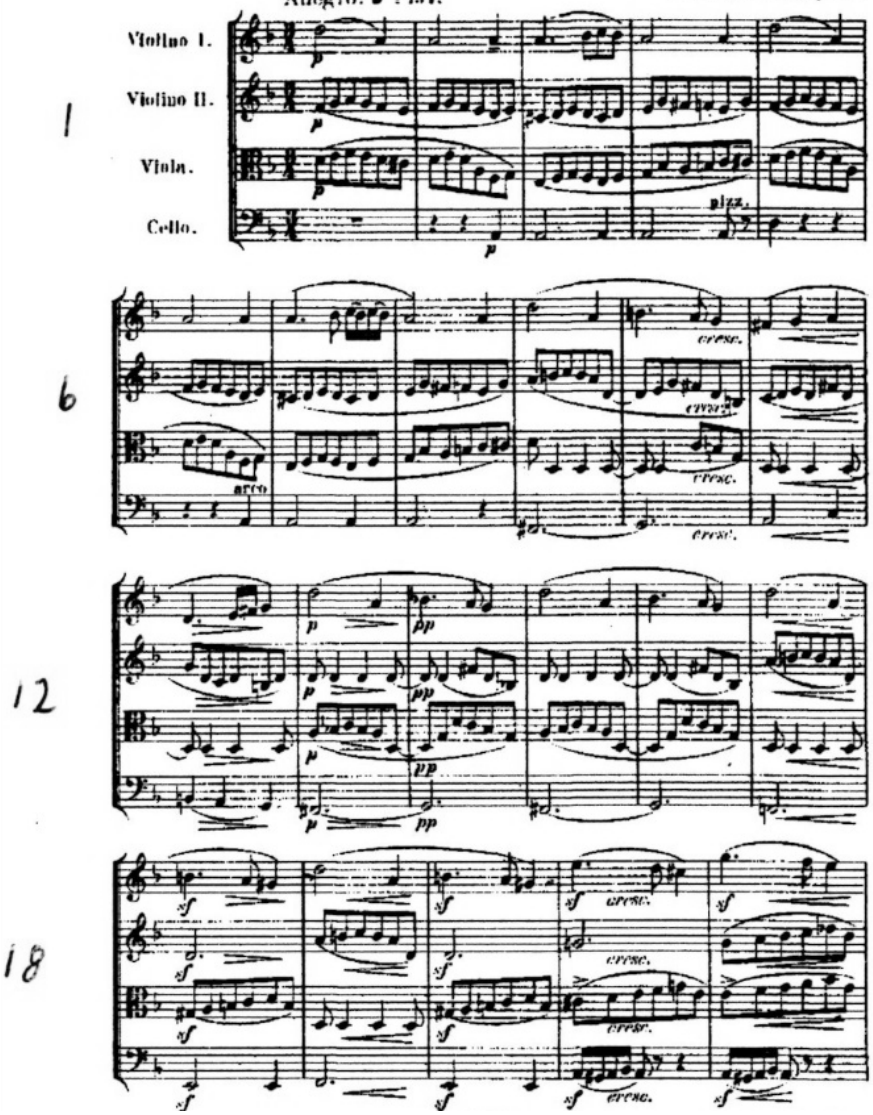


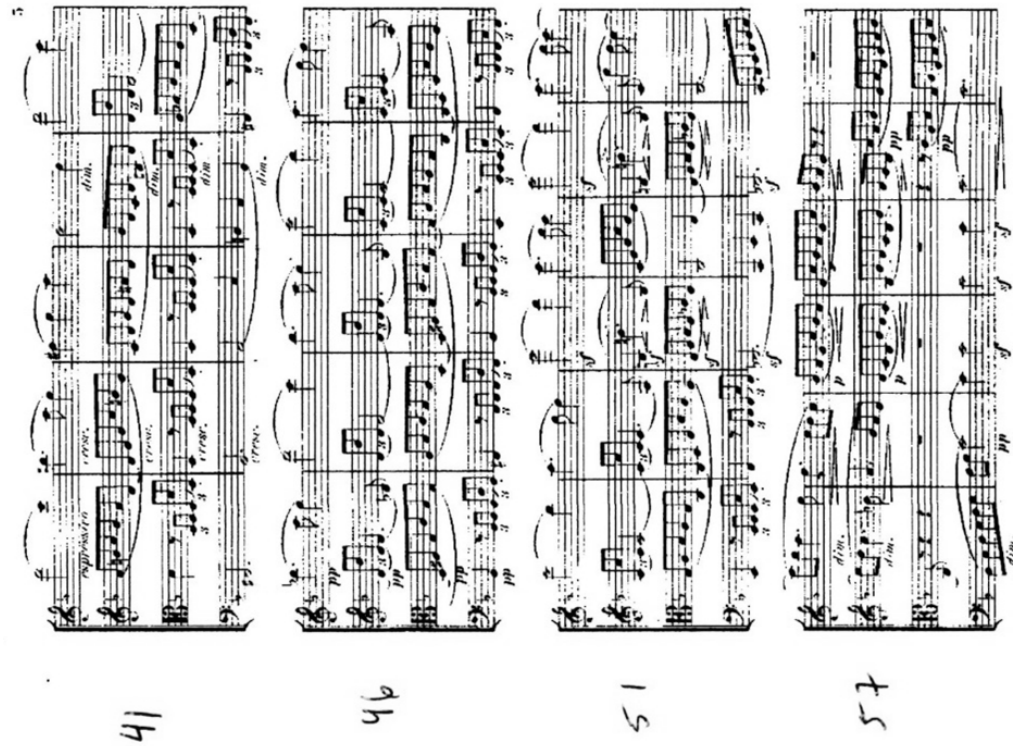

12
13
310
320
H
I
cresc.
dim.
p dim.
p espress.
legato dim.

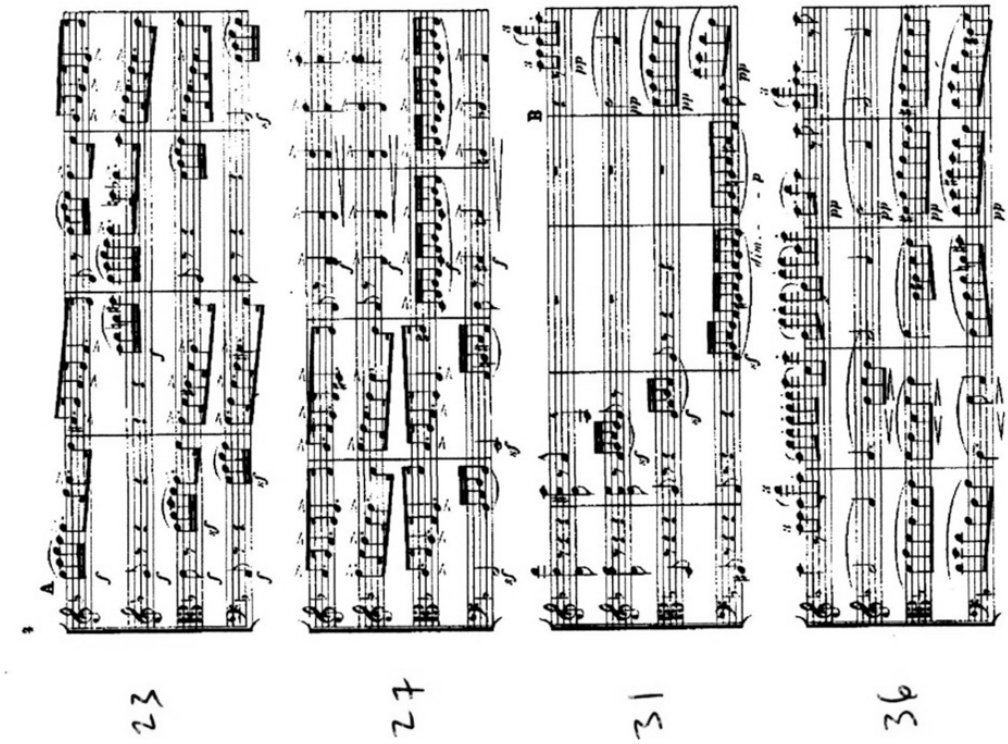

14
230
pp tranquillo
pp tranquillo
240
dim.
cresc.
K
245
250
255
molto tranquillo
260
265

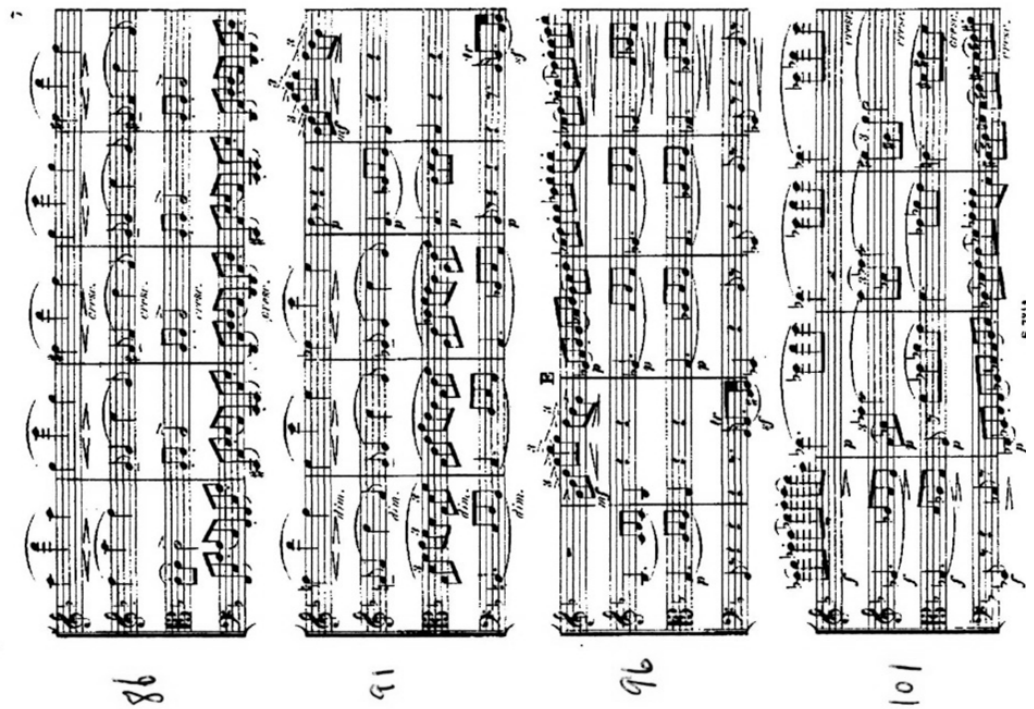
Quartetto.

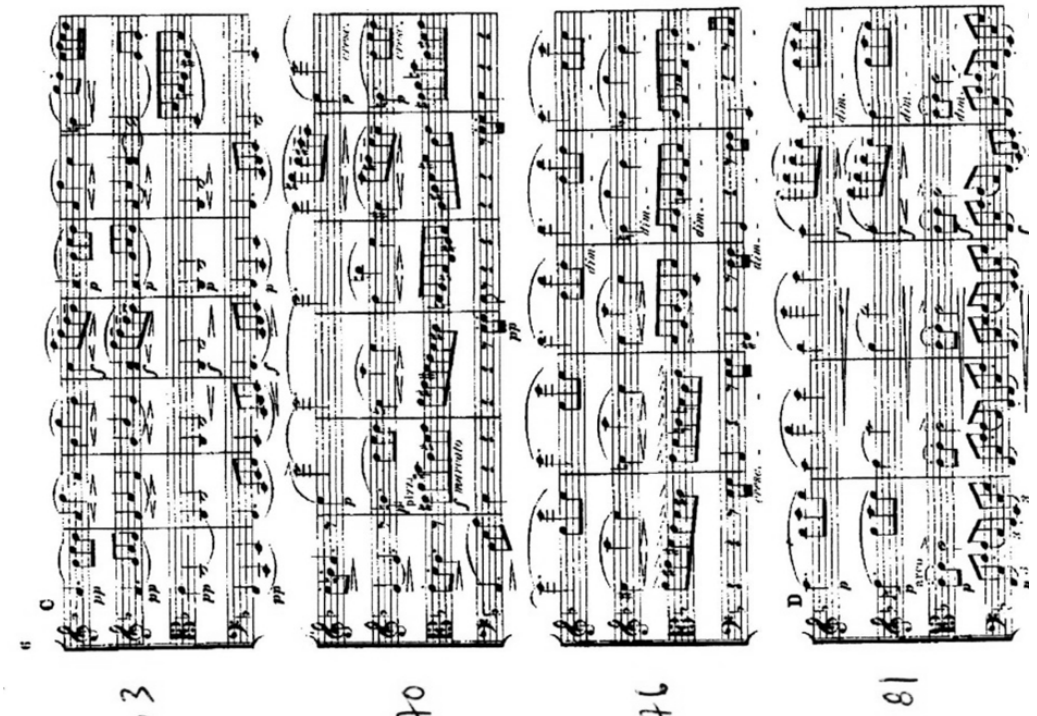
Allegro. ♩ = 134. Anton Dvořák, Op. 34.

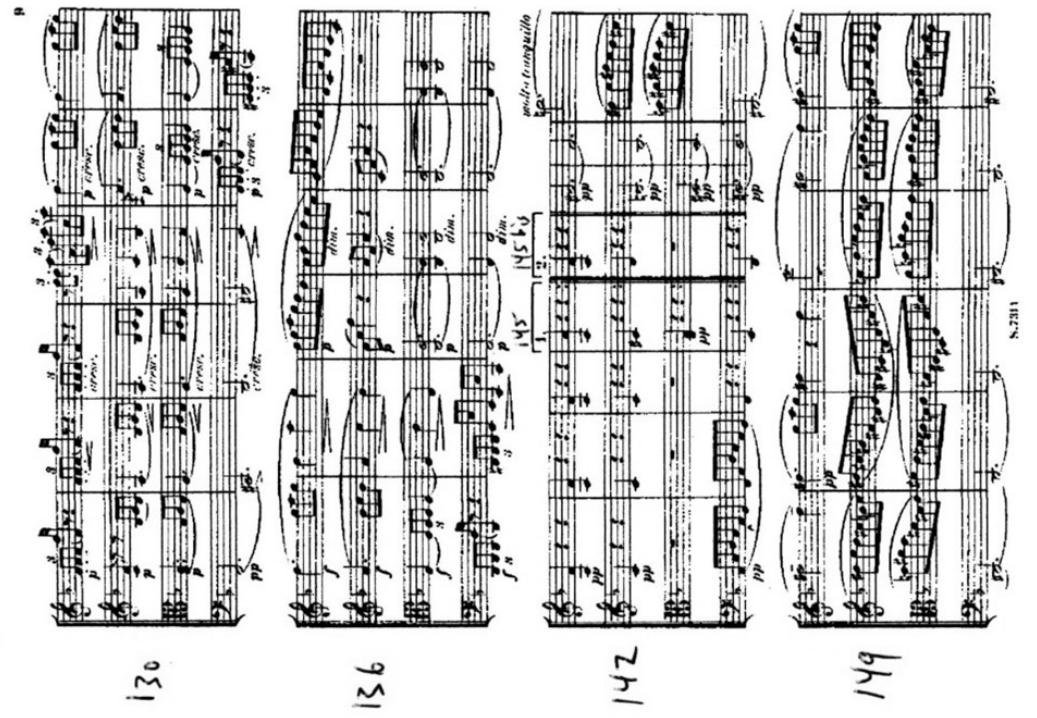


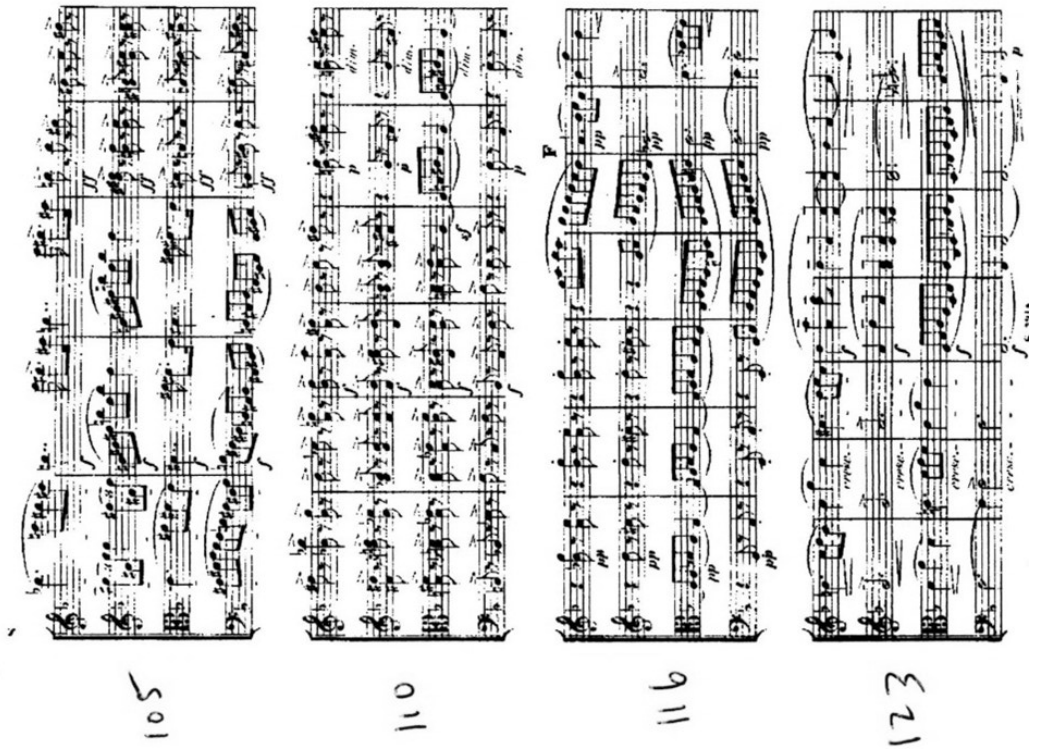

41
46
51
57

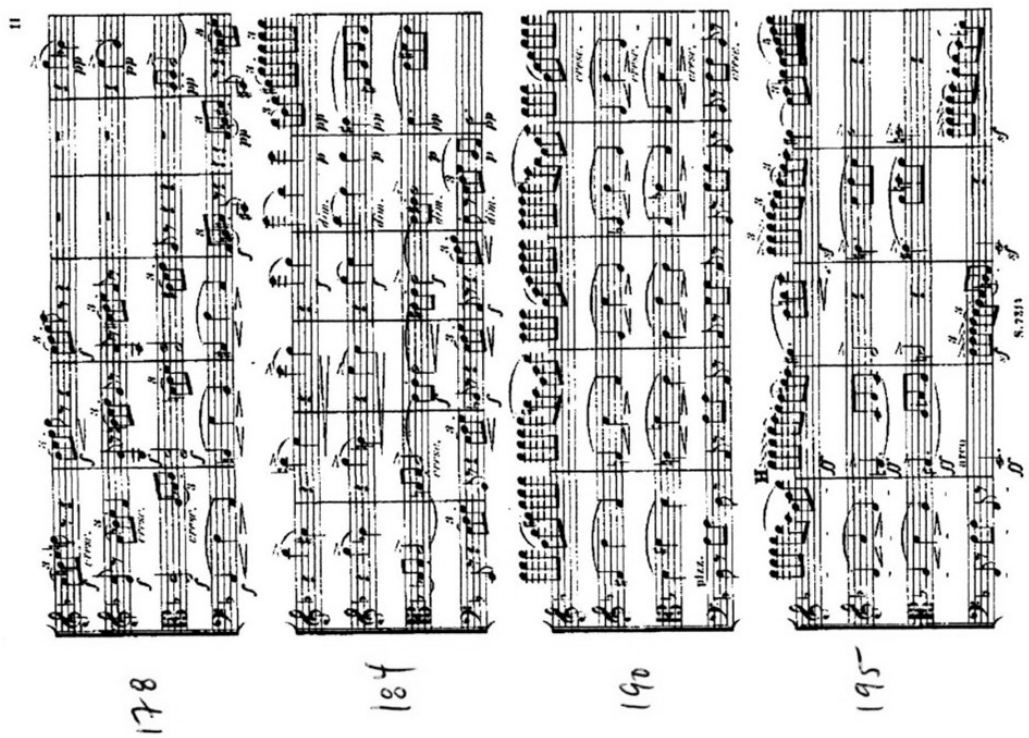

23
27
31
36

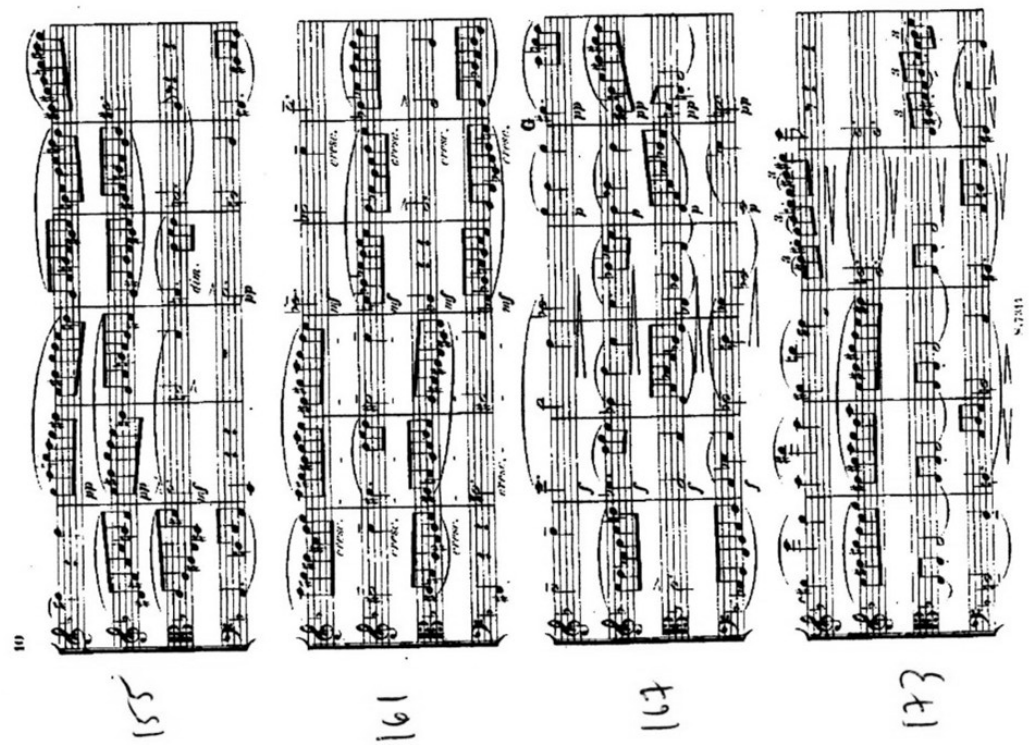

86
91
96
101

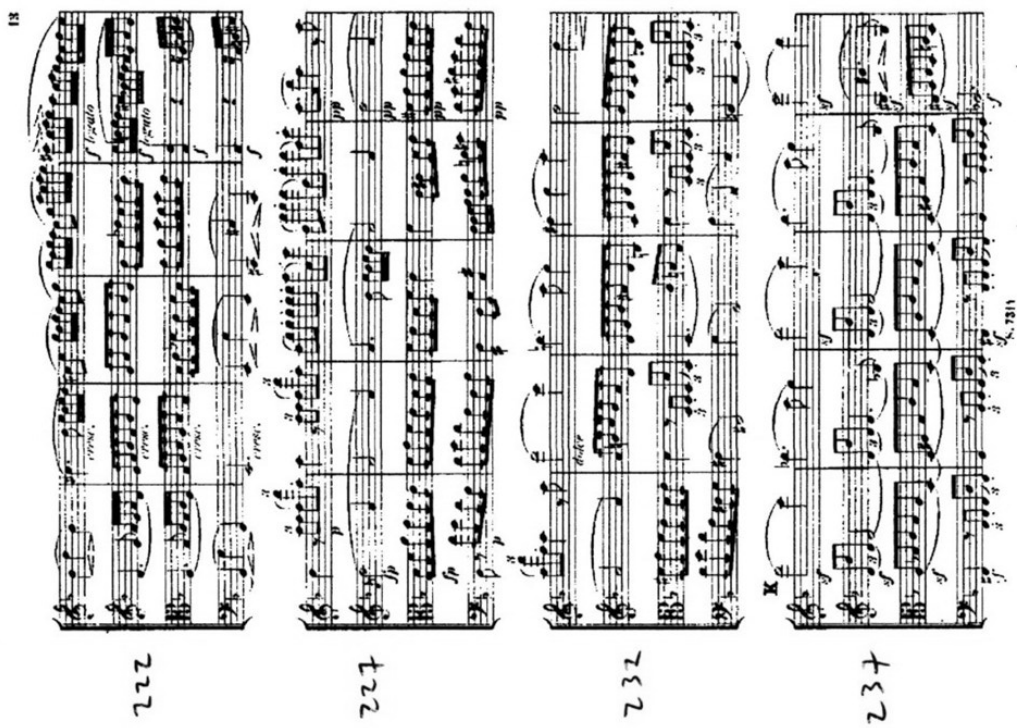

63
70
76
81


130
126
142
149

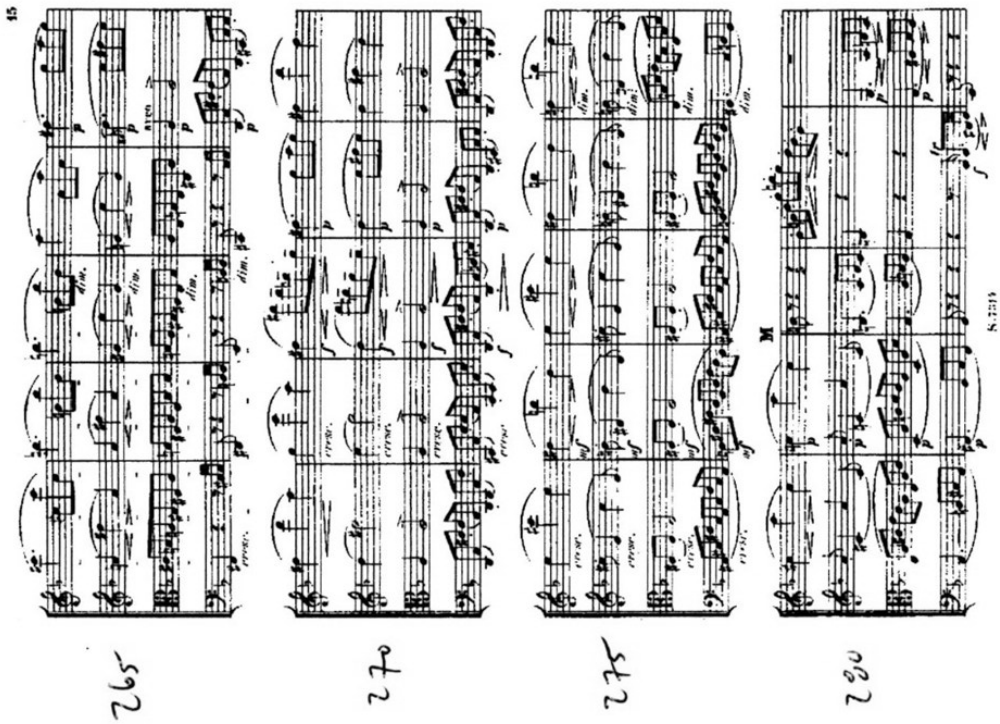

105
110
116
121

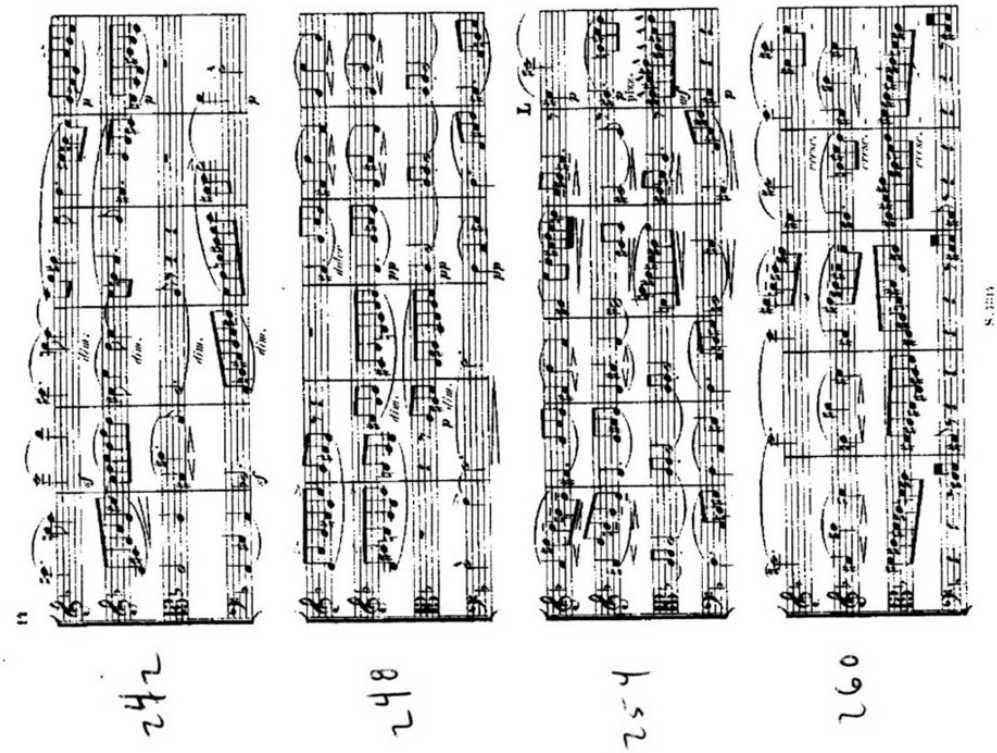

178
184
190
195

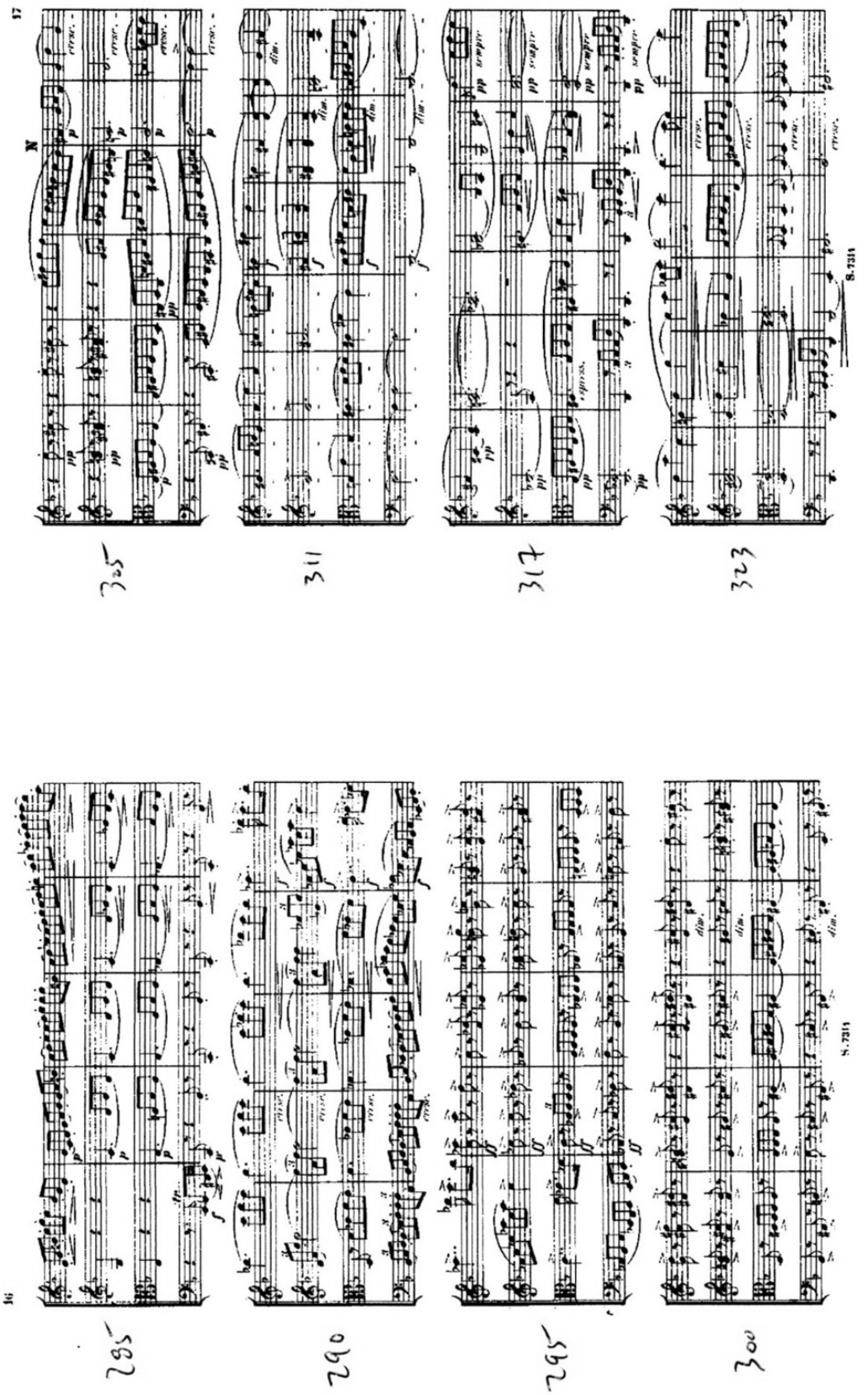

157
161
167
173

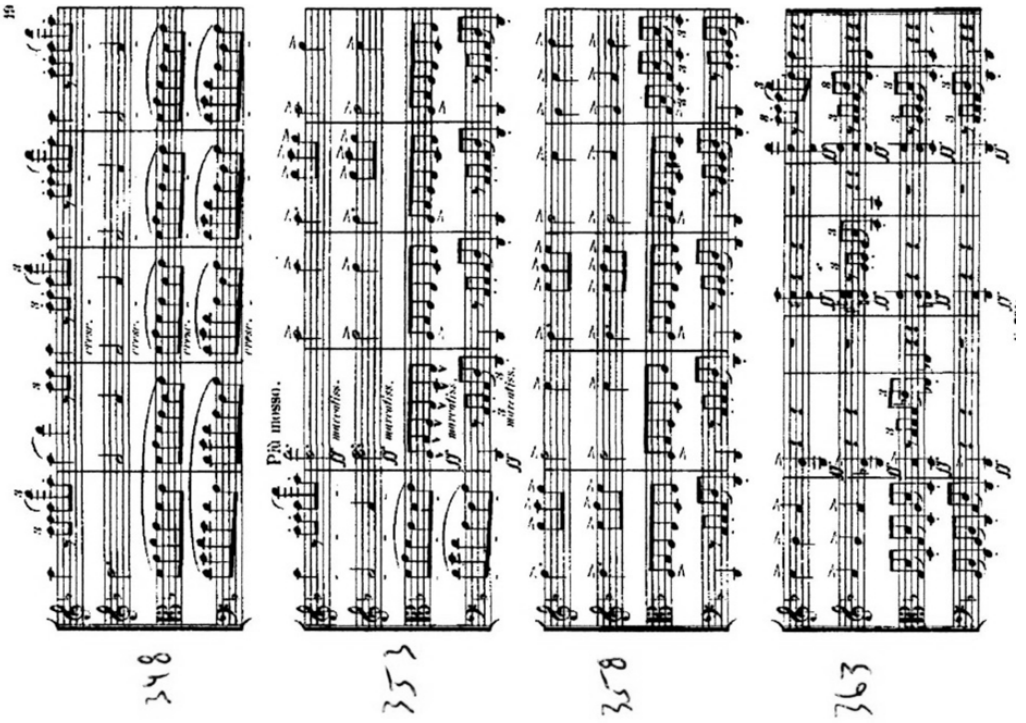

12
200
205
210
216

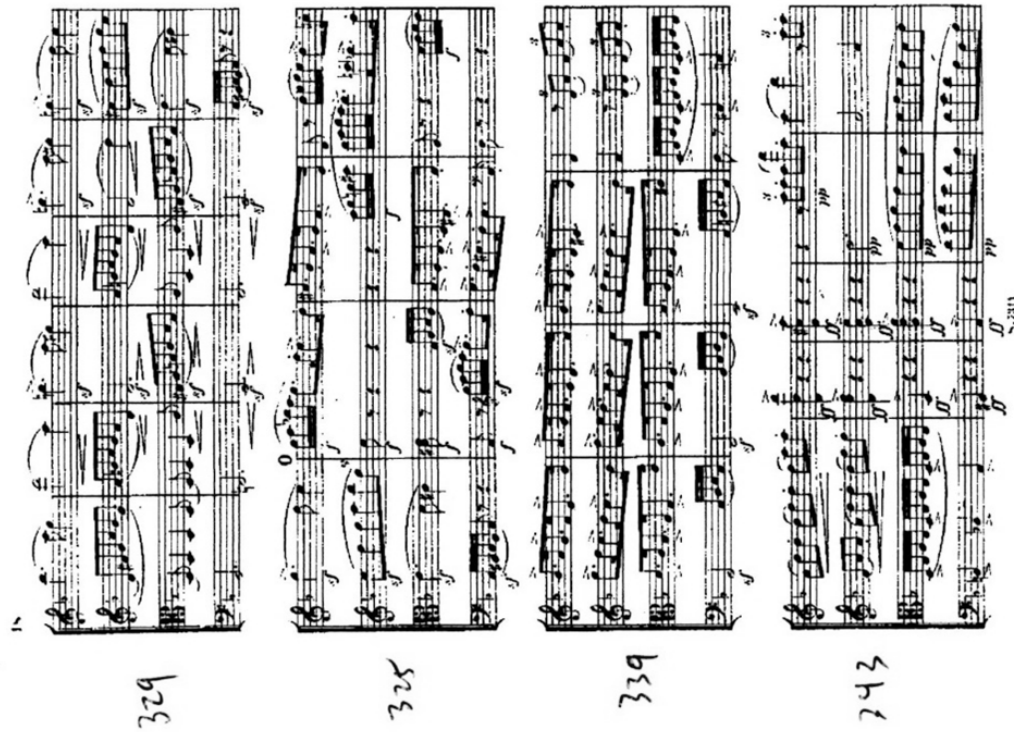
13
222
227
232
234

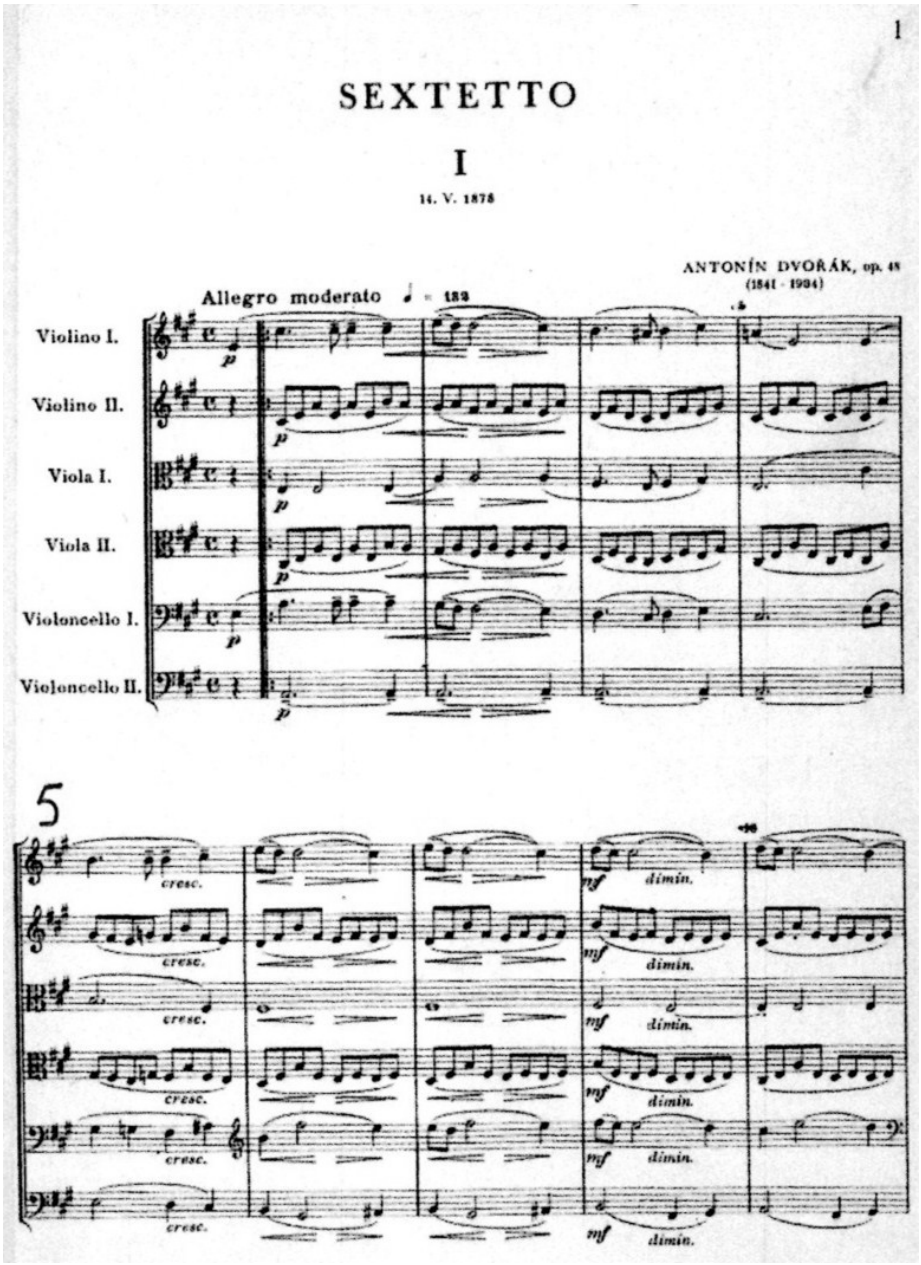


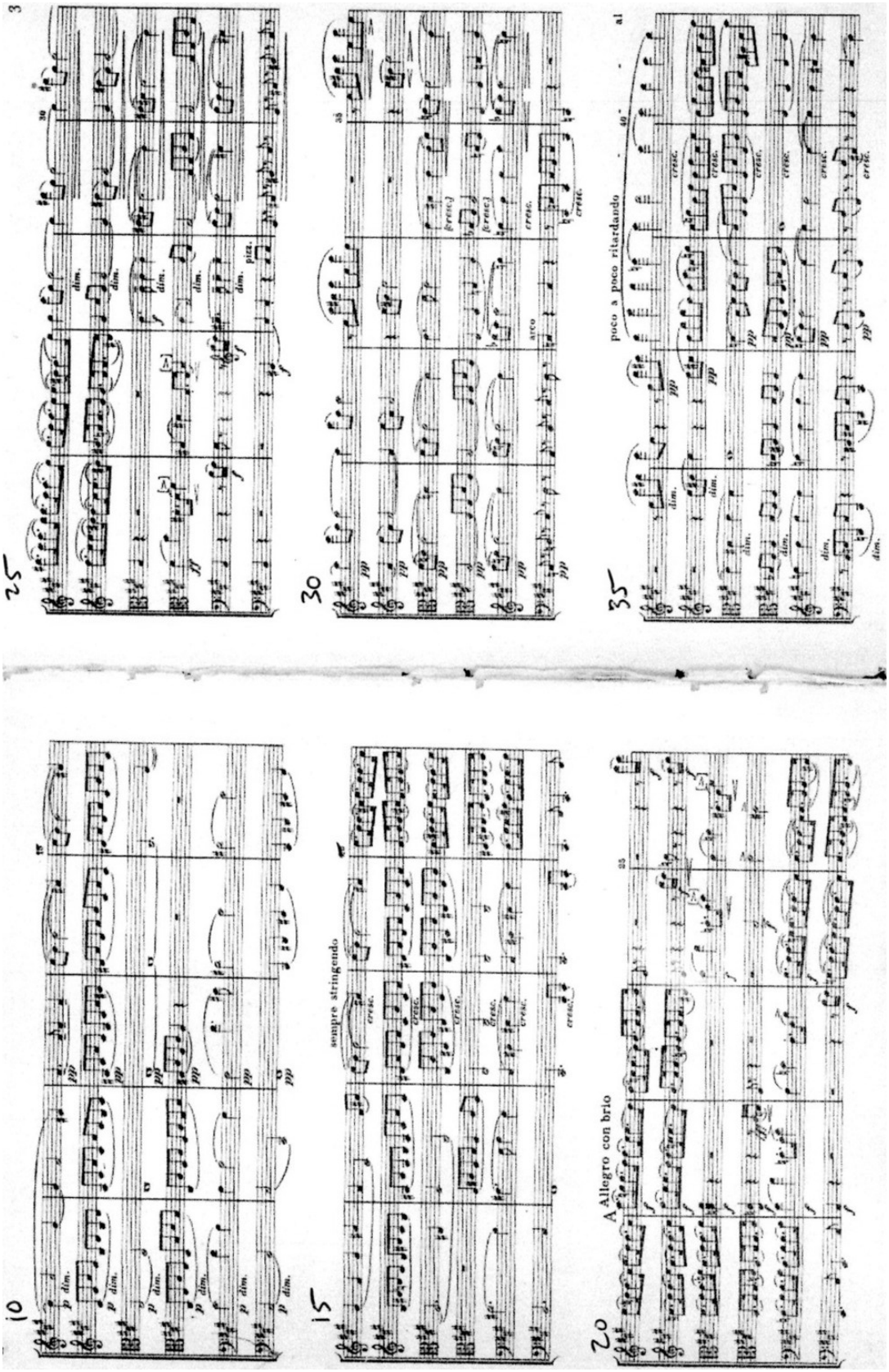


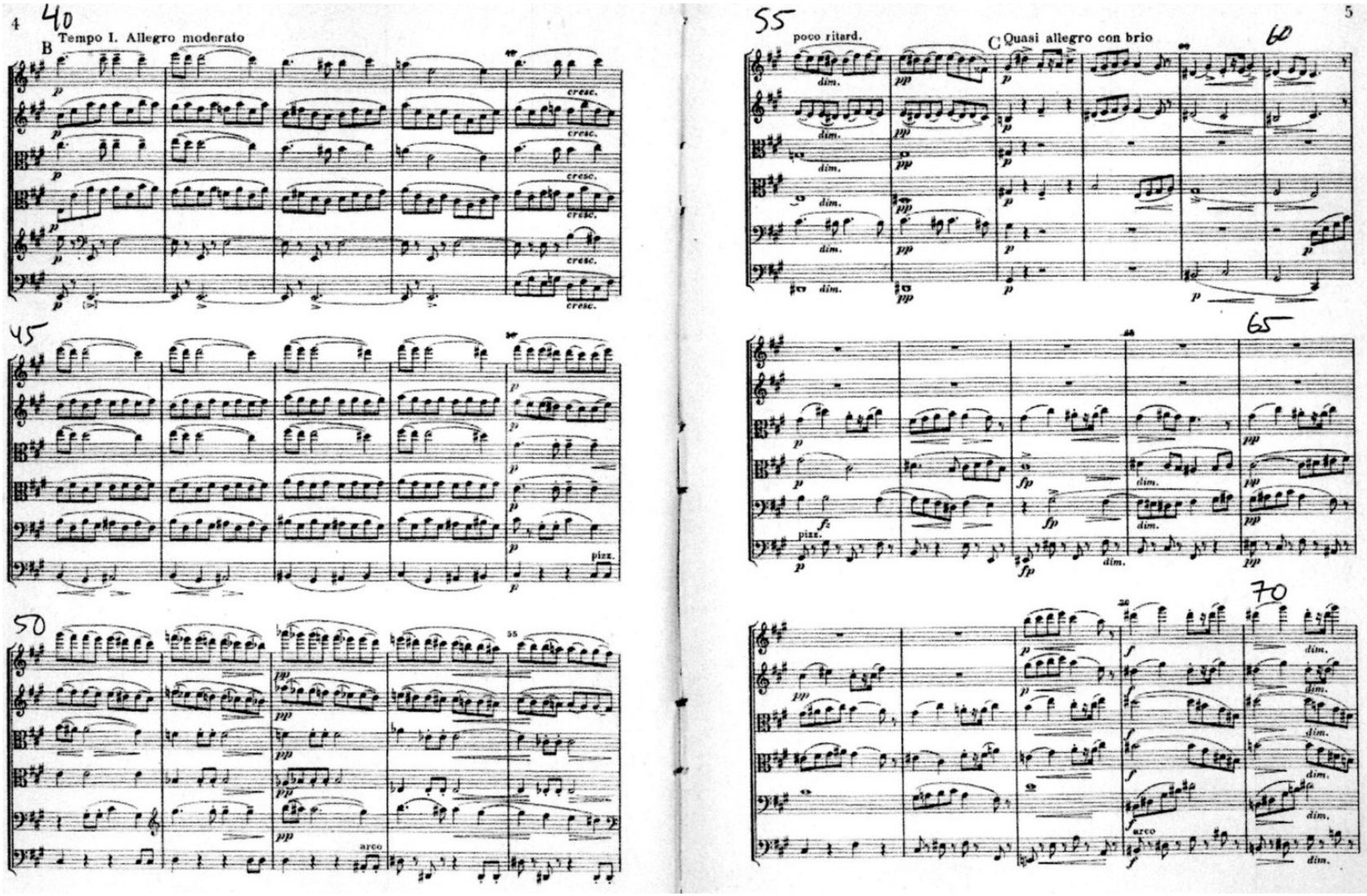

285
290
295
300
305
311
317
323

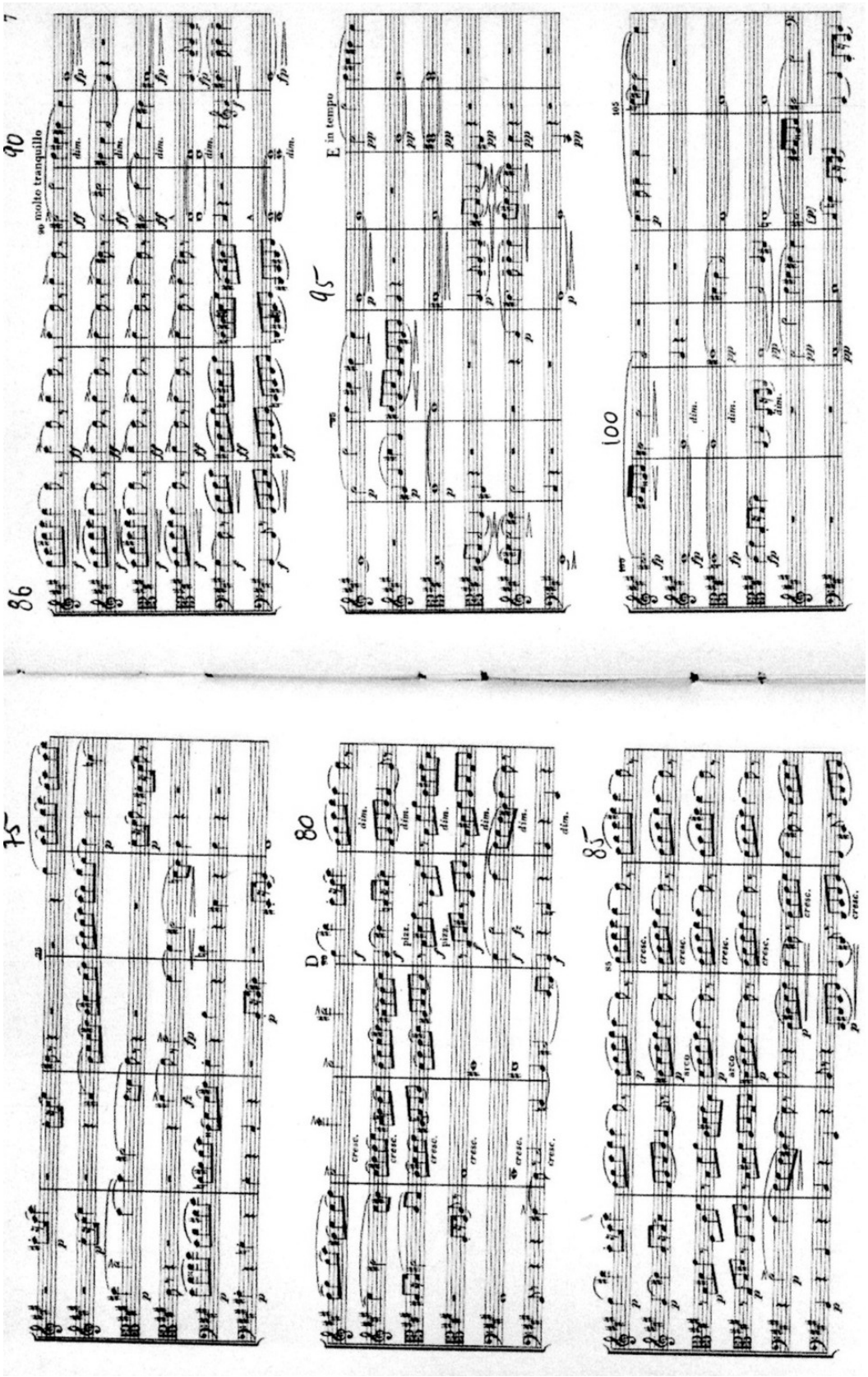

348
353
358
363

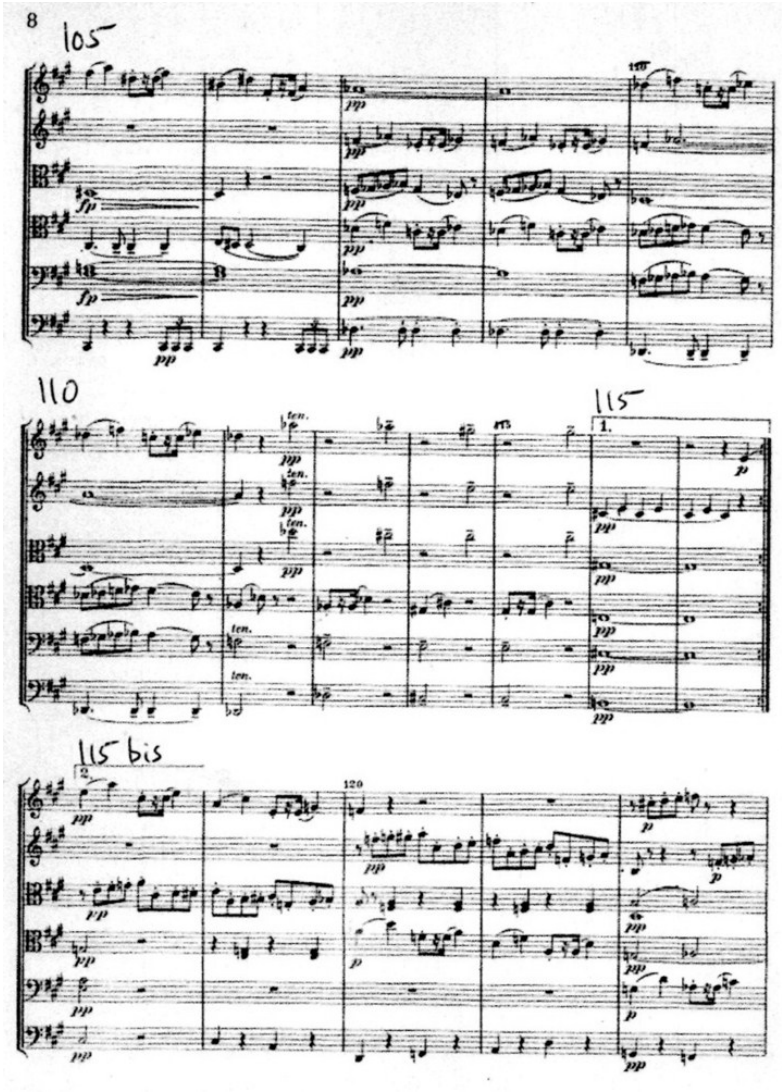

329
334
339
343

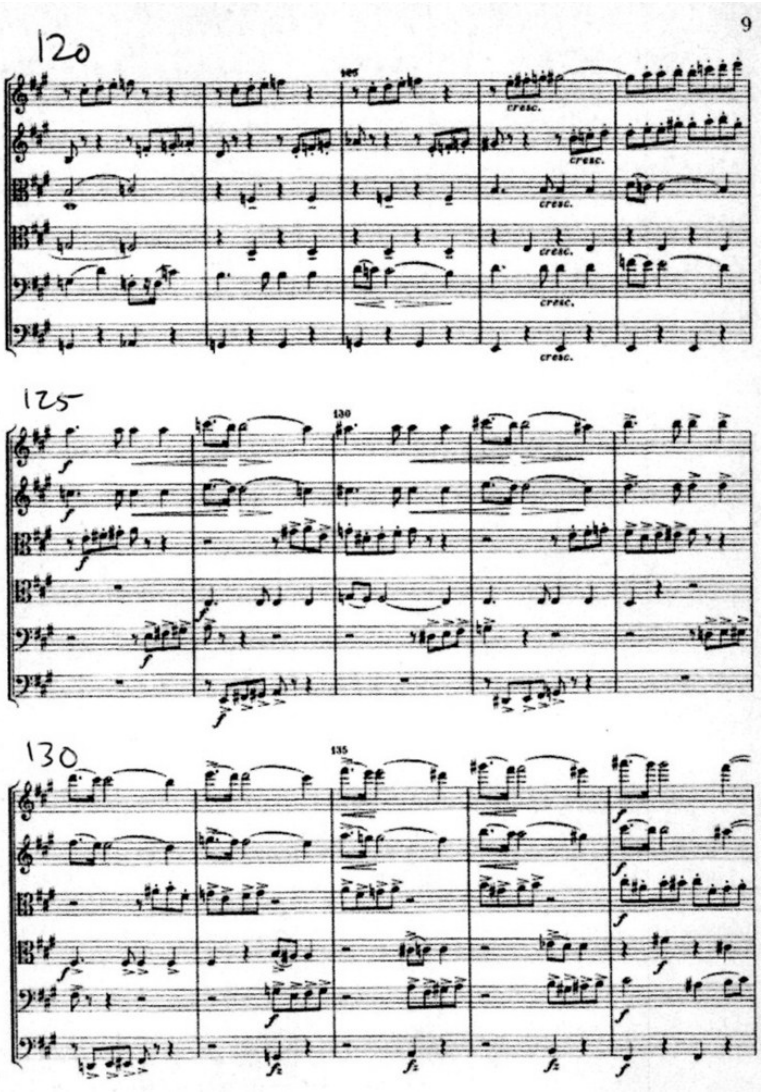

1
SEXTETTO
I
14. V. 1878
ANTONÍN DVOŘÁK, op. 48
(1841 - 1904)
Allegro moderato
Violino I.
Violino II.
Viola I.
Viola II.
Violoncello I.
Violoncello II.
5
cresc.
mf
dimin.

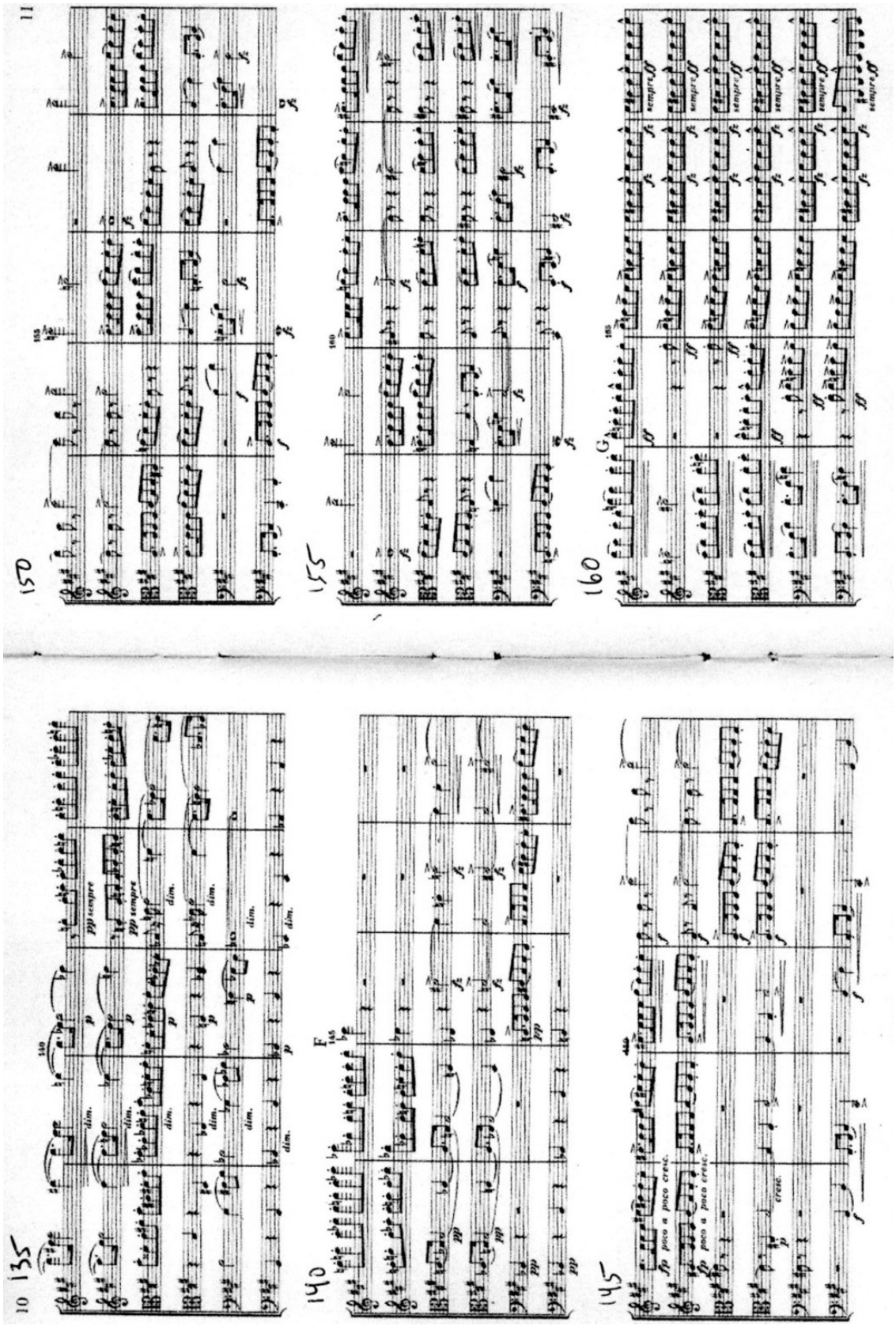

10
15
20
25
30
35
sempre stringendo
A Allegro con brio
poco a poco ritardando

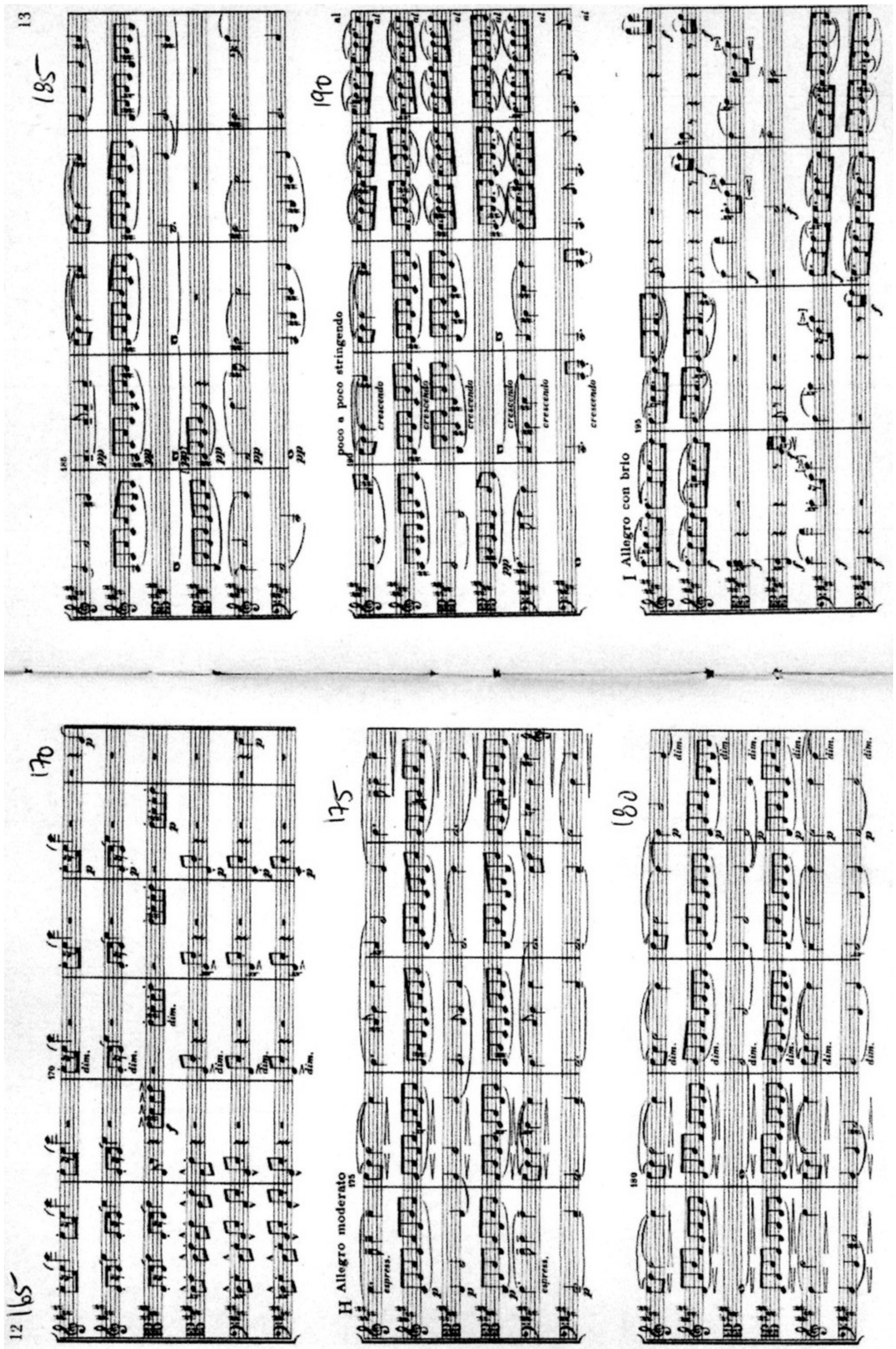

4
40
Tempo I. Allegro moderato
B
cresc.
45
pizz.
50
arco
55
poco ritard.
C Quasi allegro con brio
60
65
70
dim.
pizz.
arco


90
86
w molto tranquillo
E in tempo
95
100
105
75
80
D
85

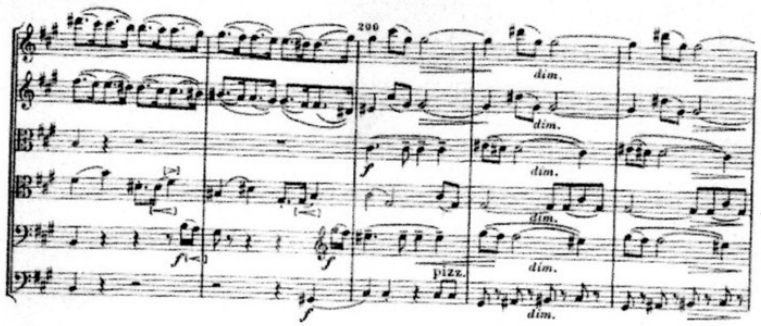

105
110
115
115 bis


120
125
130

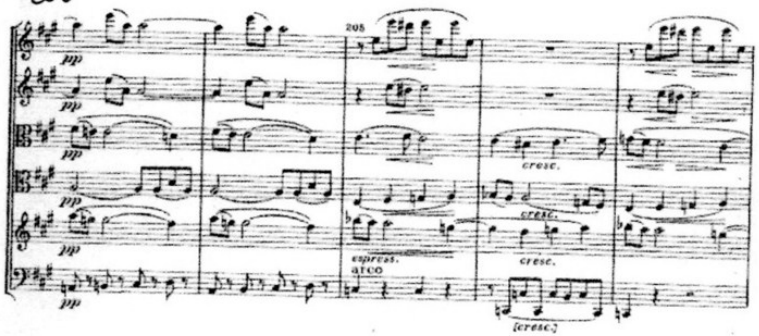

10
11
135
140
145
150
155
160
F
G
poco a poco cresc.
sempre ff
ppp sempre
dim.


12
H Allegro moderato
espress.
dim.
13
poco a poco stringendo
crescendo
I Allegro con brio

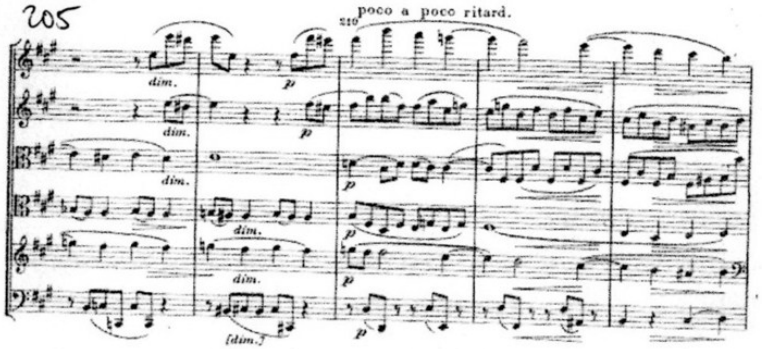
195



200

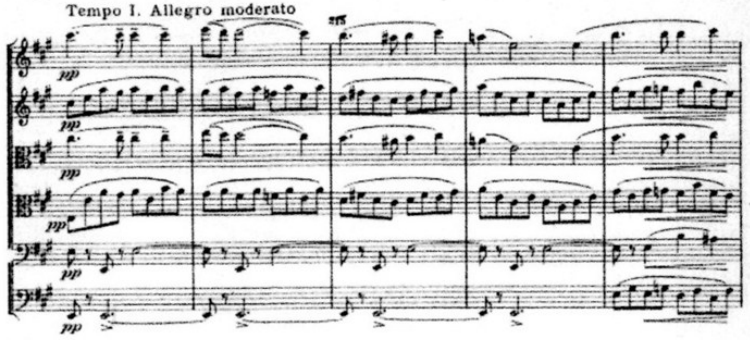


205

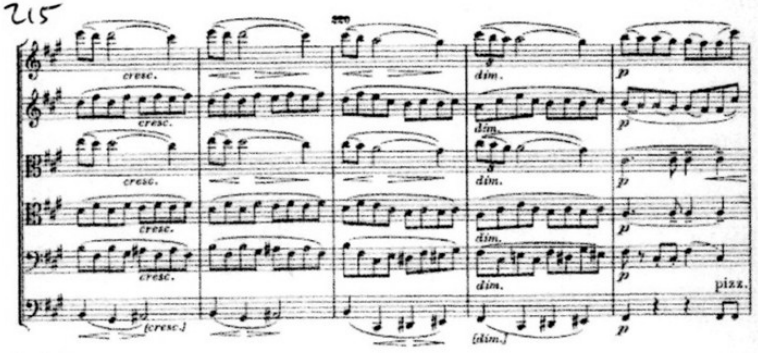


210

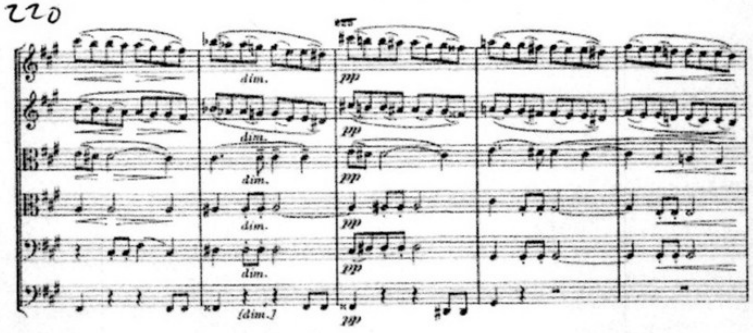
Tempo I. Allegro moderato

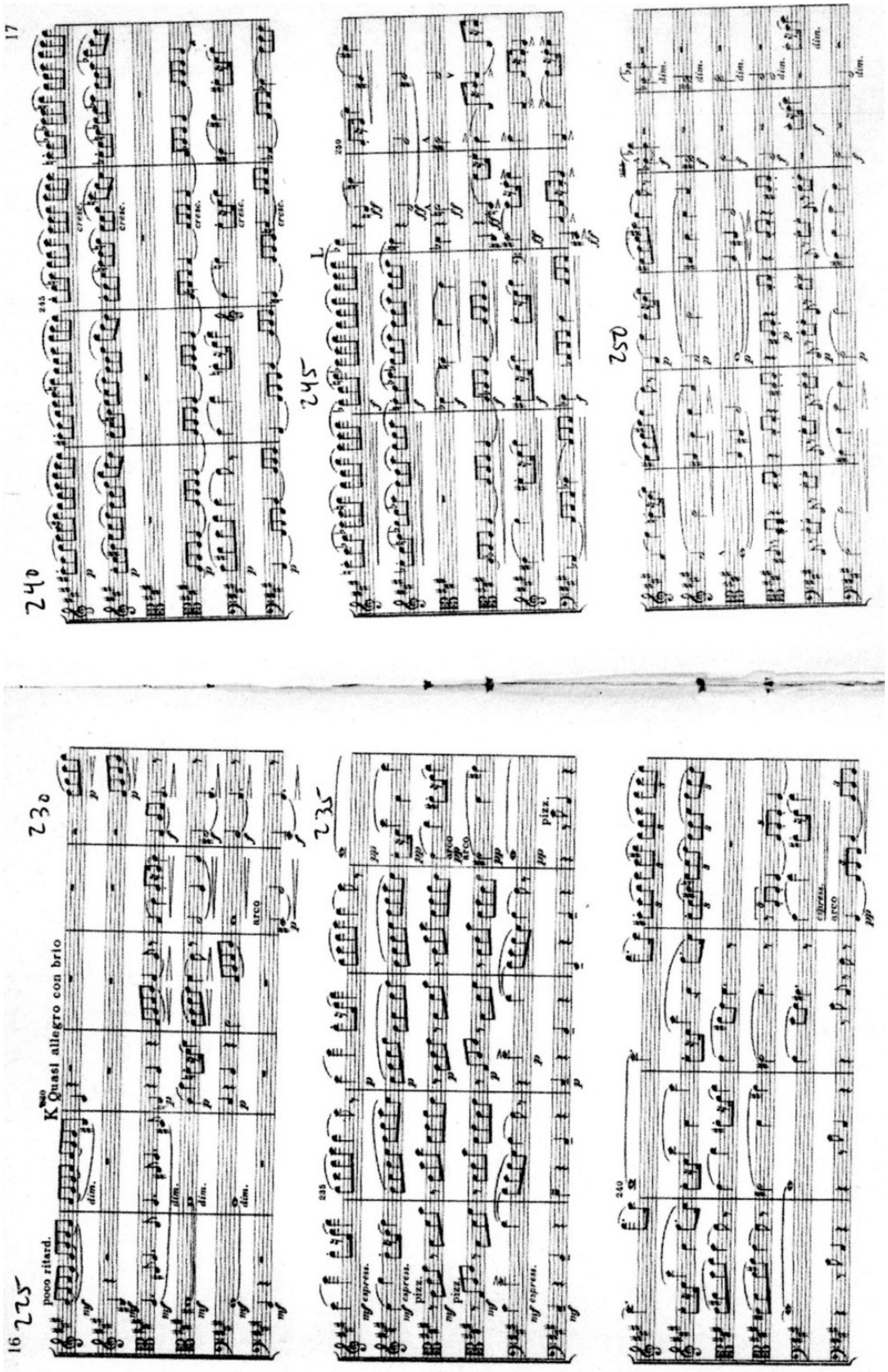


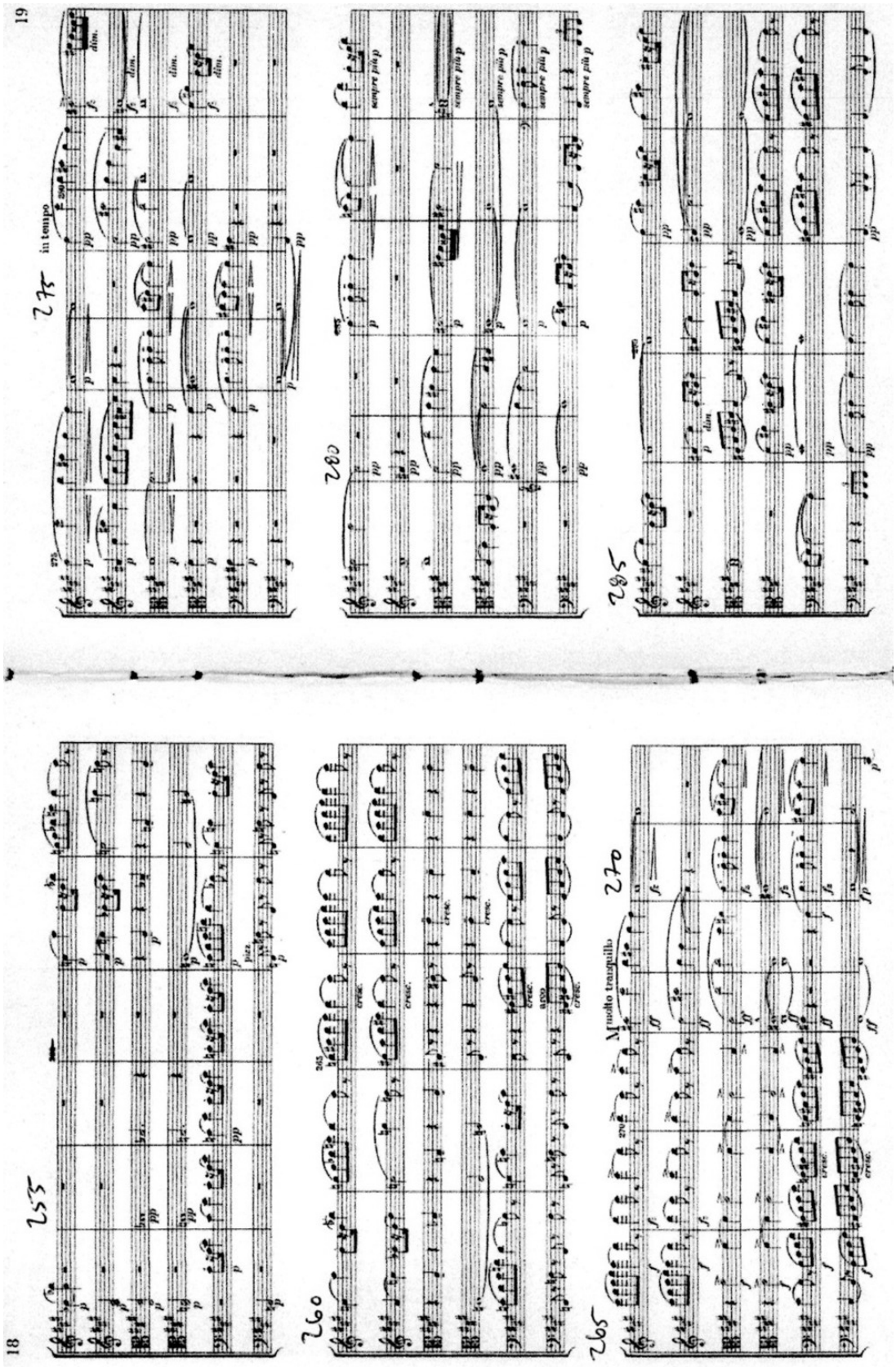
215

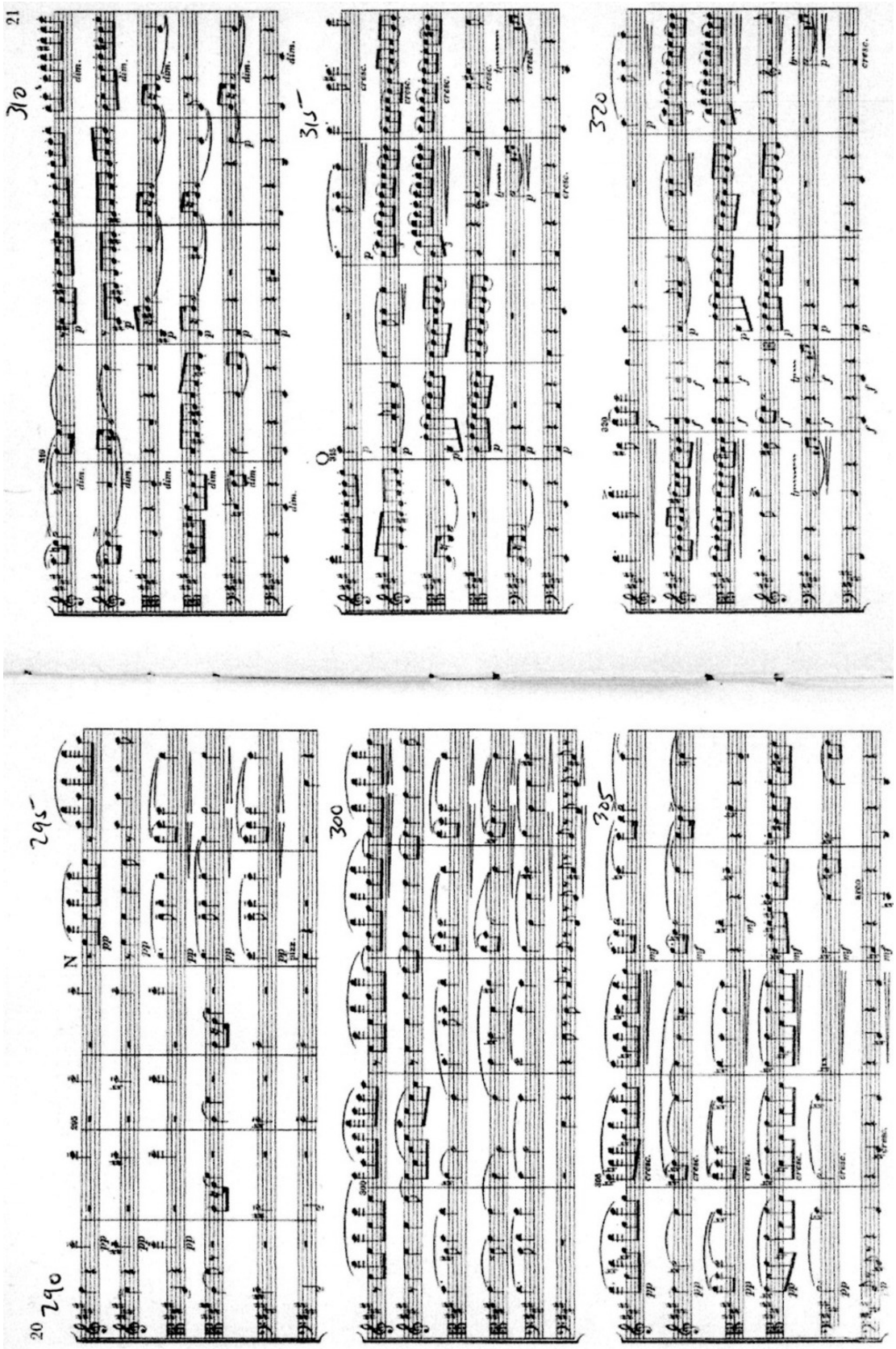


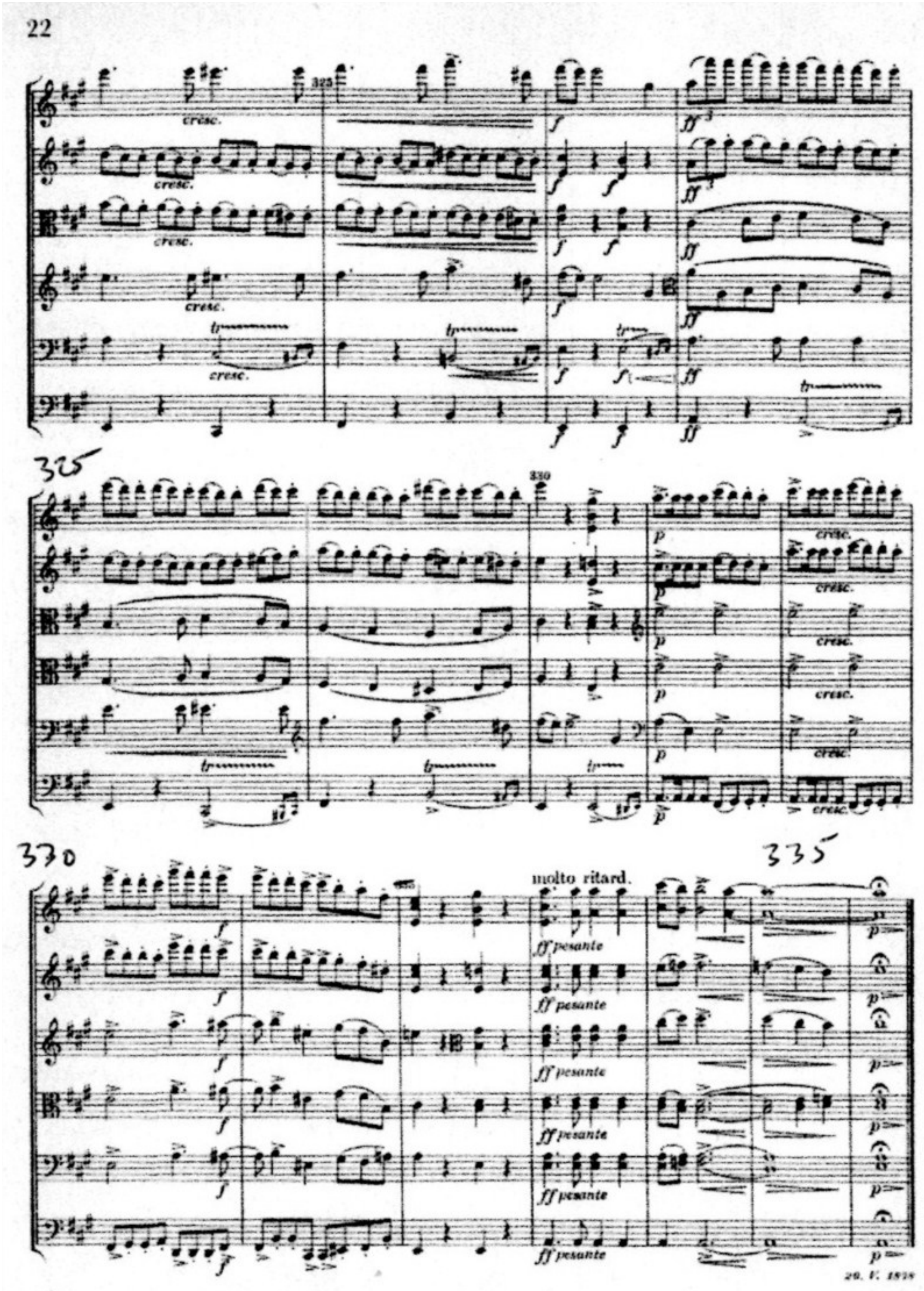
220

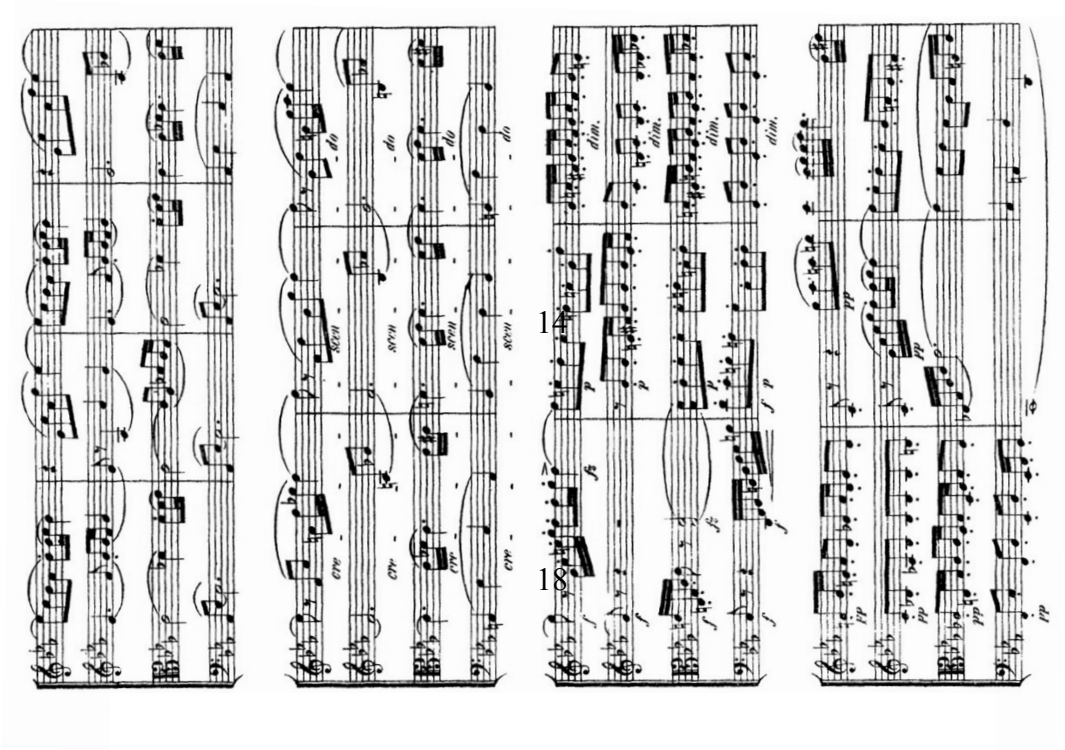


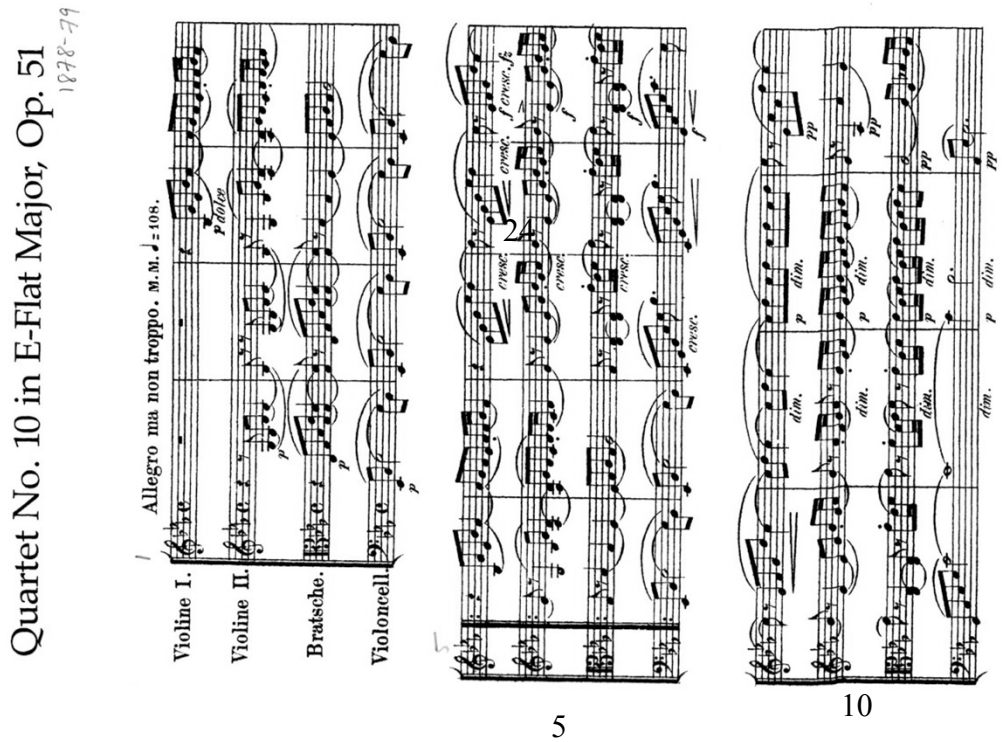

poco ritard.
Quasi allegro con brio
arco
pizz.
cresc.
dim.

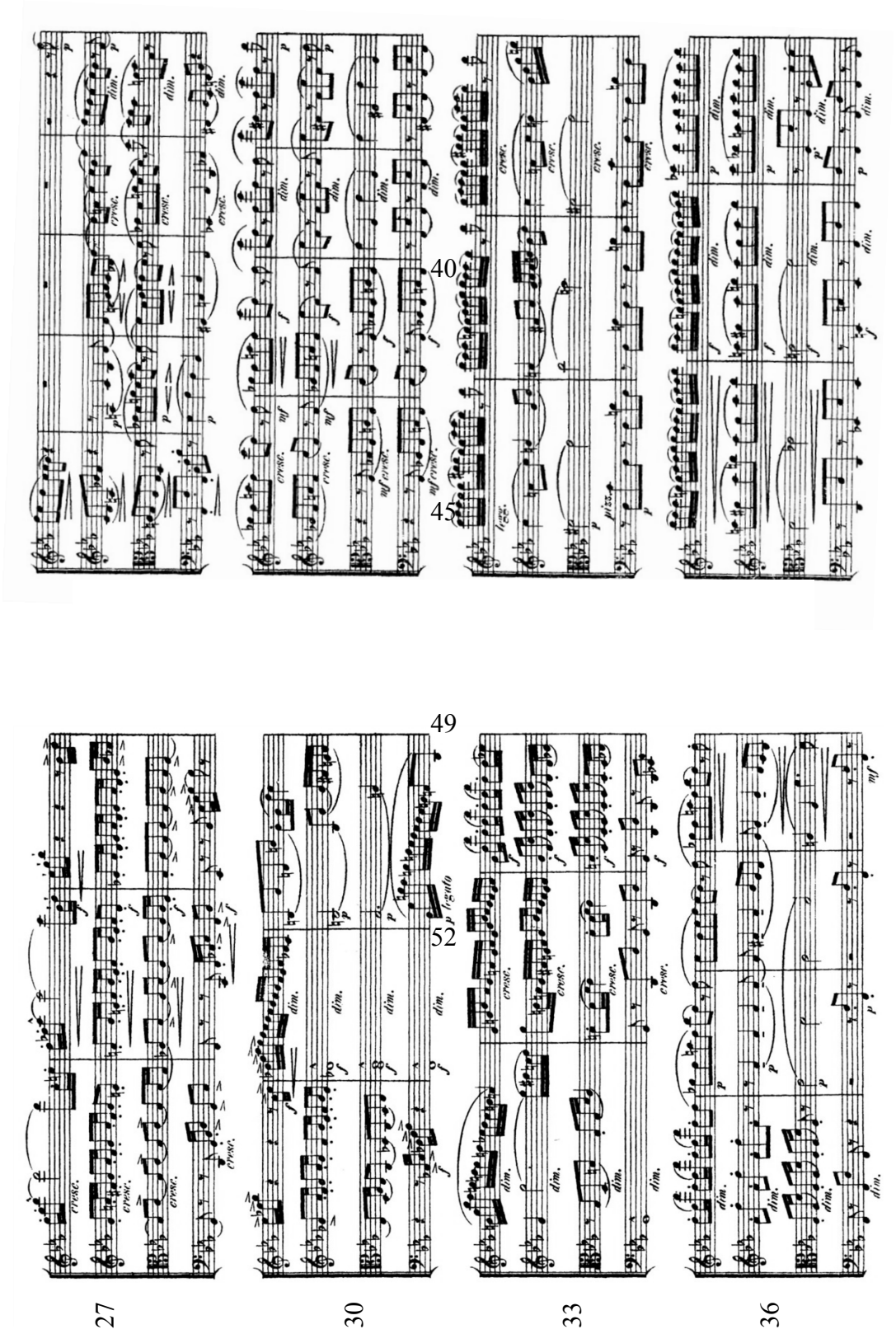

18
19
255
260
265
270
275
280
285
in tempo
Molto tranquillo
cresc.
dim.
sempre più p

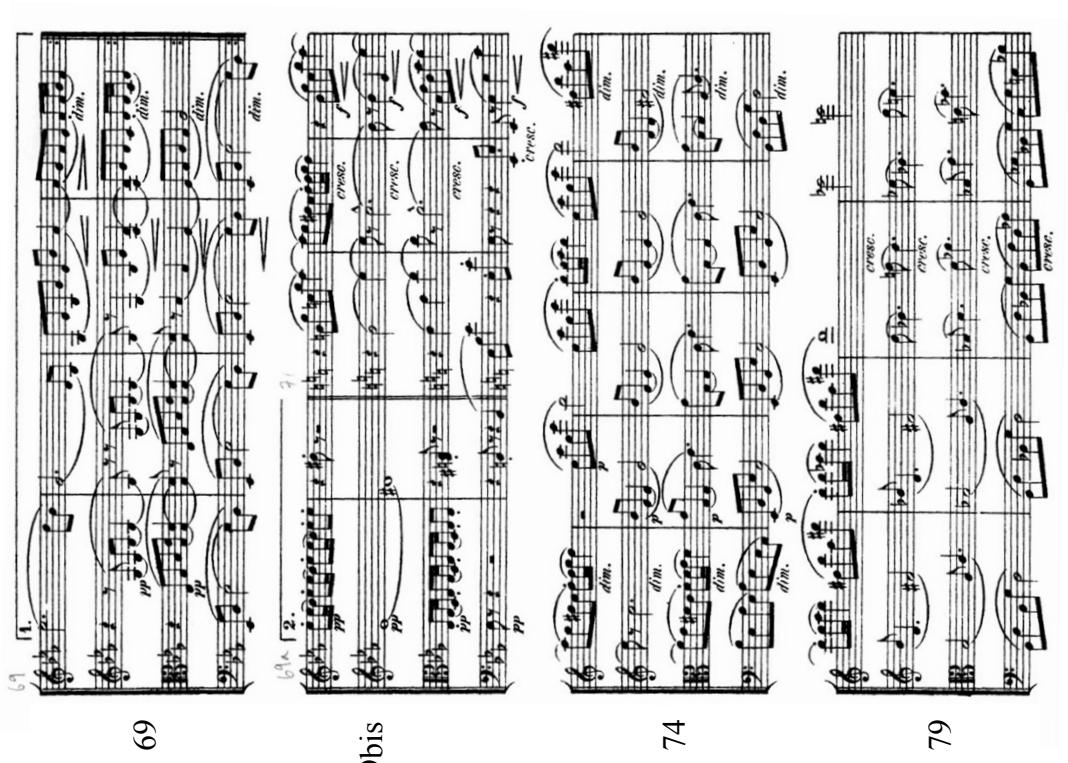

20
290
295
300
305
310
315
320
21

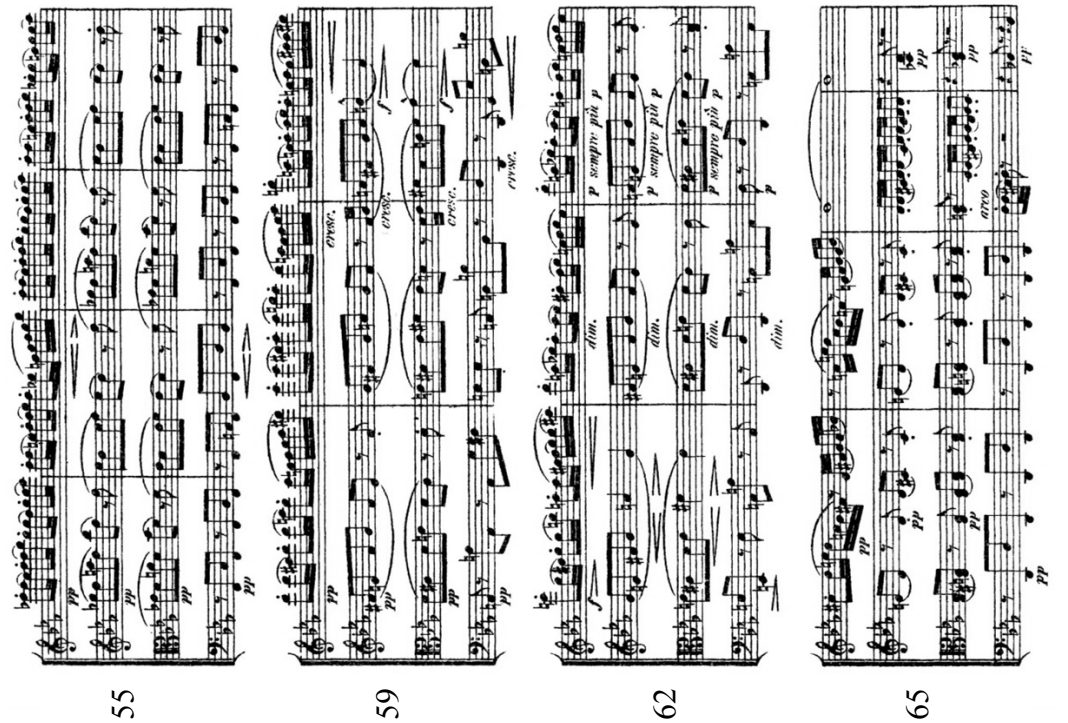

22
cresc.
molto ritard.
ff pesante
20. V. 1878

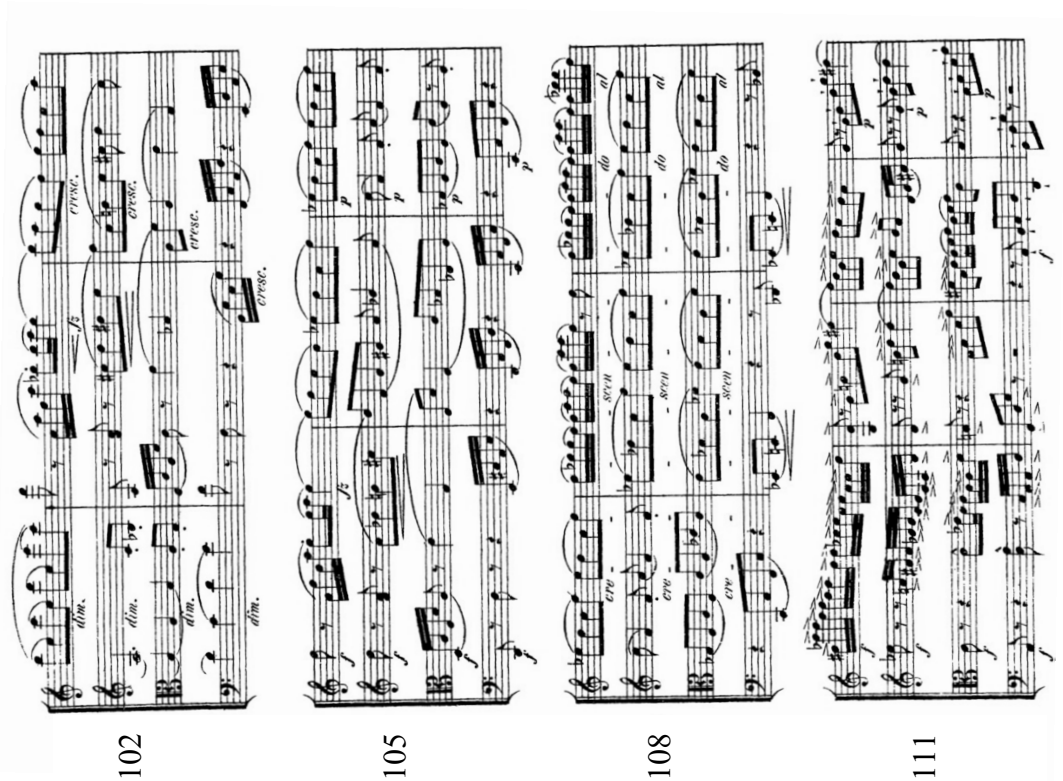

14
18
21

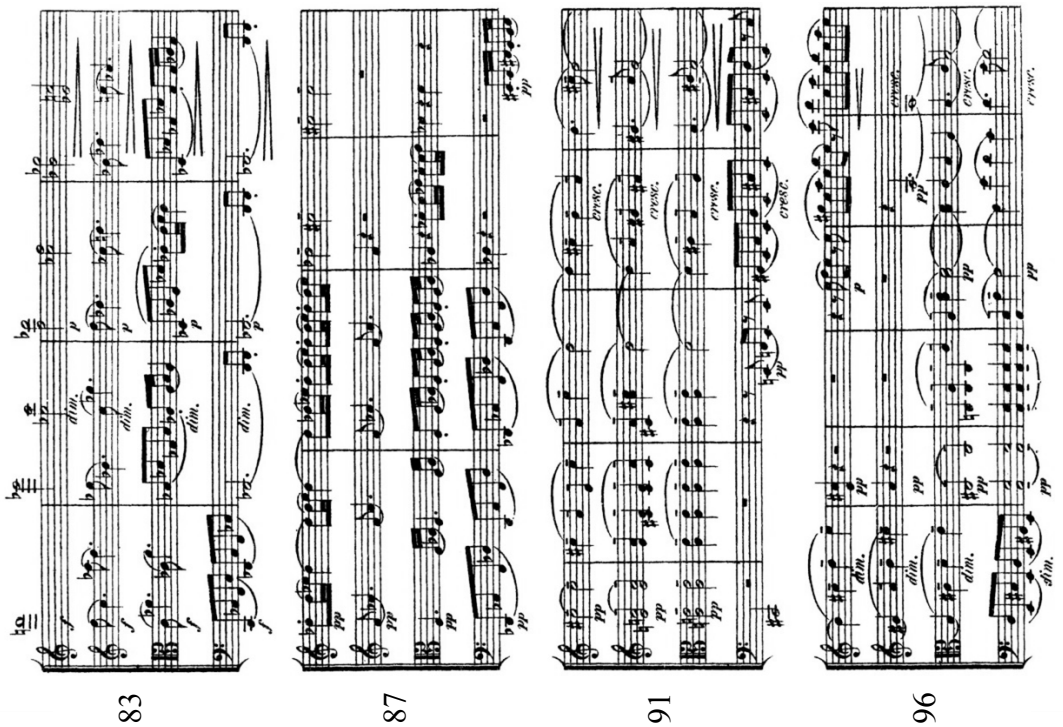

Quartet No. 10 in E-Flat Major, Op. 51
1878-79
Allegro ma non troppo. M.M. ♩= 108.
Violine I.
Violine II.
Bratsche.
Violoncell.
24
5
10

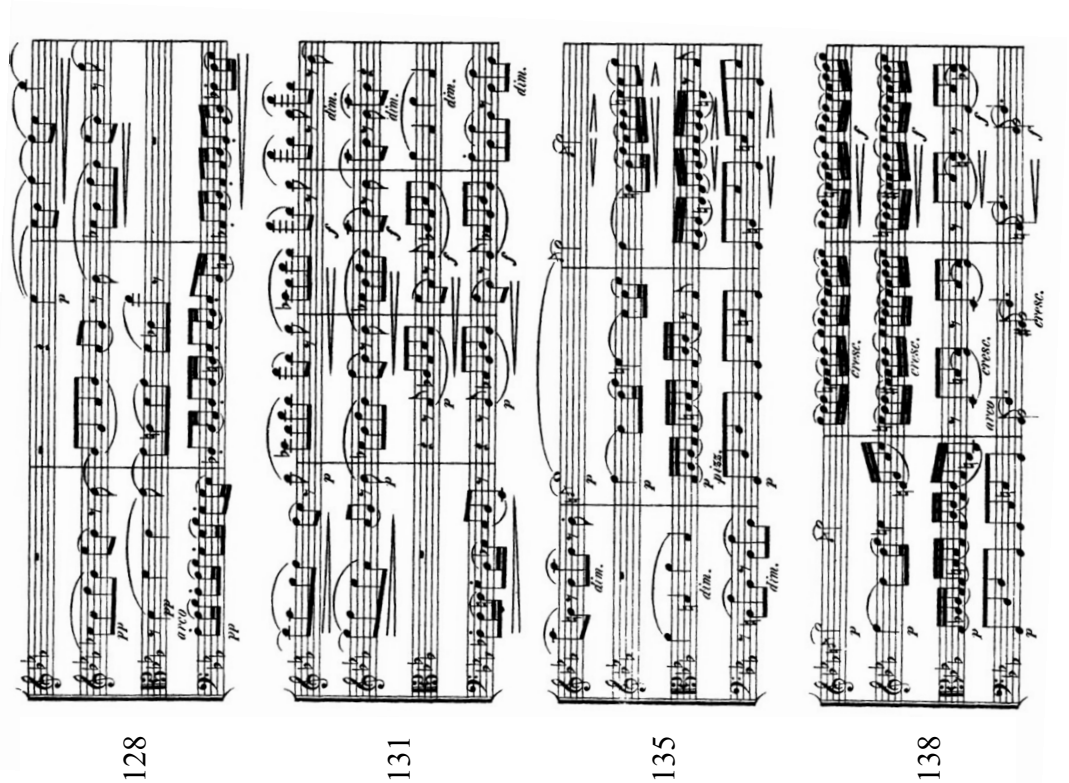

27
30
33
36
40
45
49
52

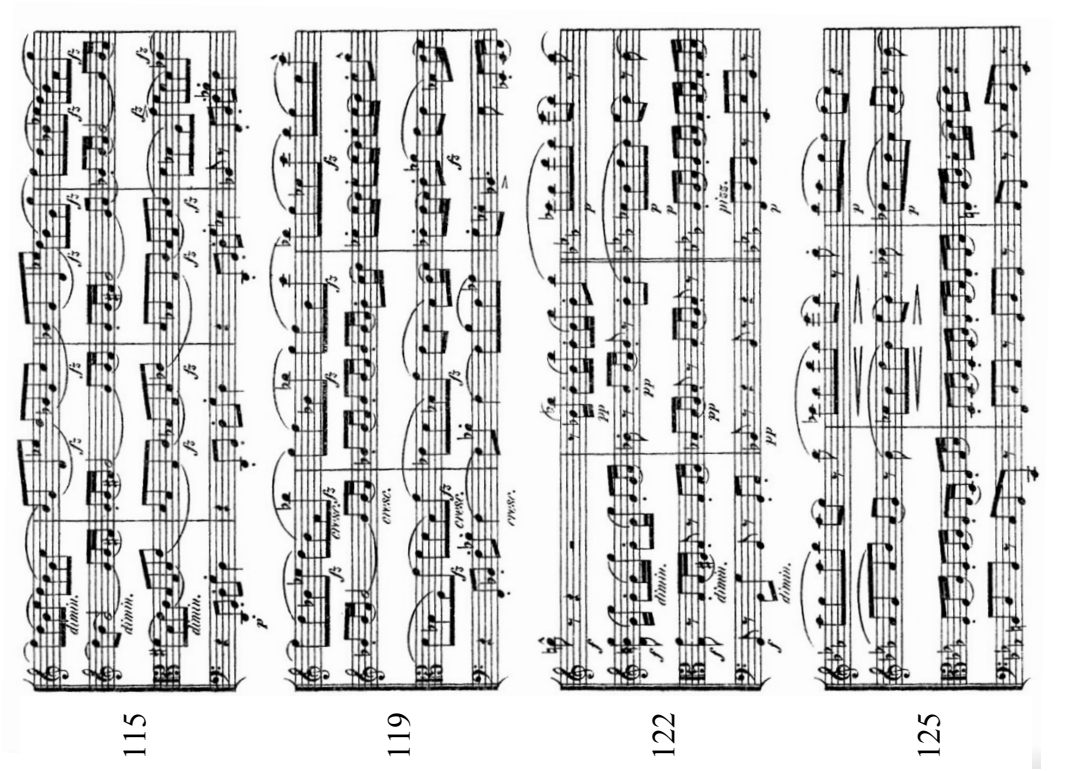

69
69bis
74
79

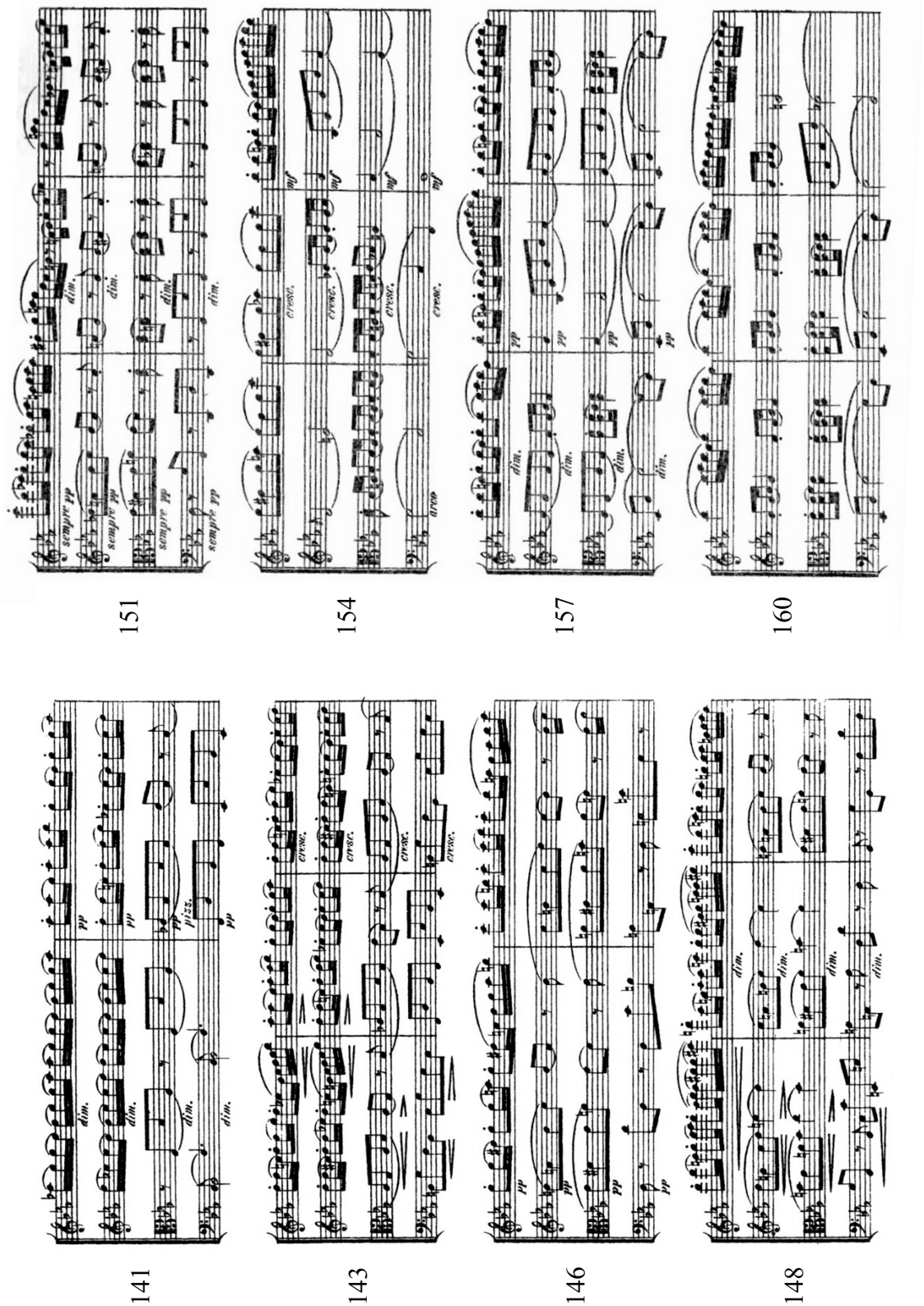

55
59
62
65

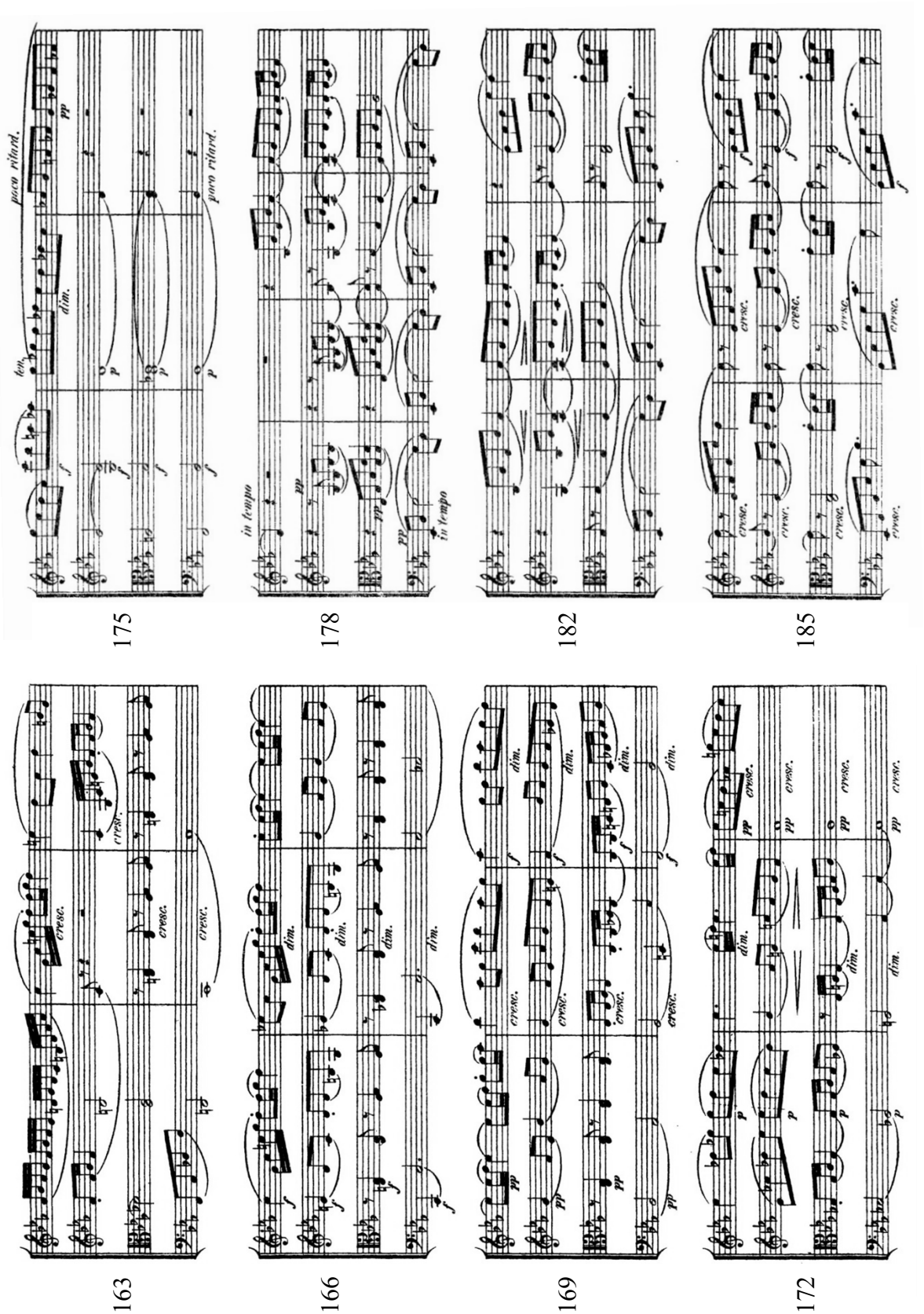

102
105
108
111


83
87
91
96

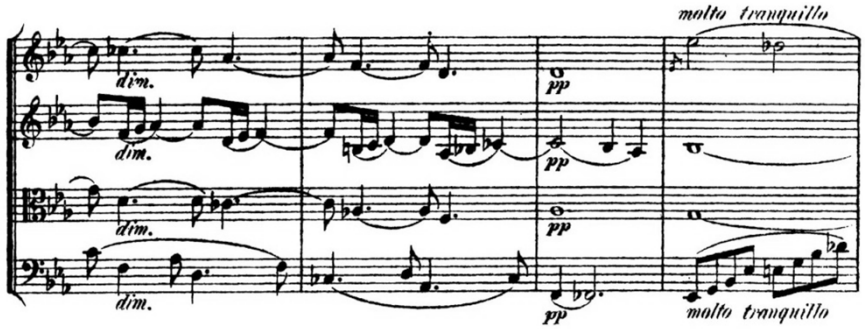

128
131
135
138


115
119
122
125

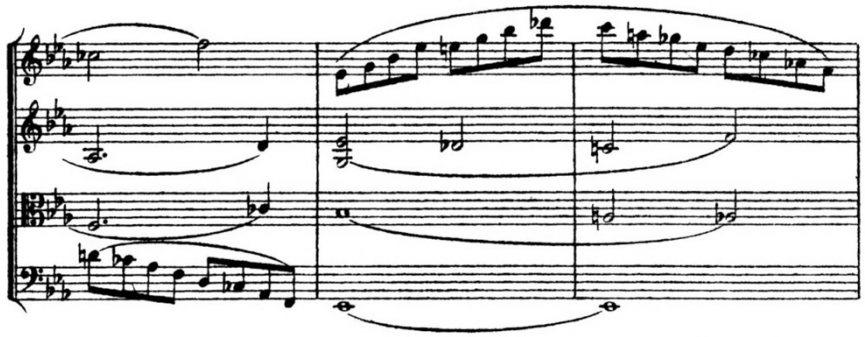

141
143
146
148
151
154
157
160


163
166
169
172
175
178
182
185
cresc.
dim.
poco ritard.
in tempo
a tempo

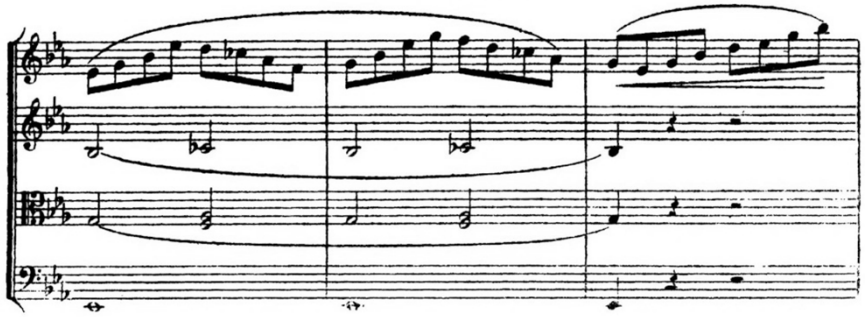
188



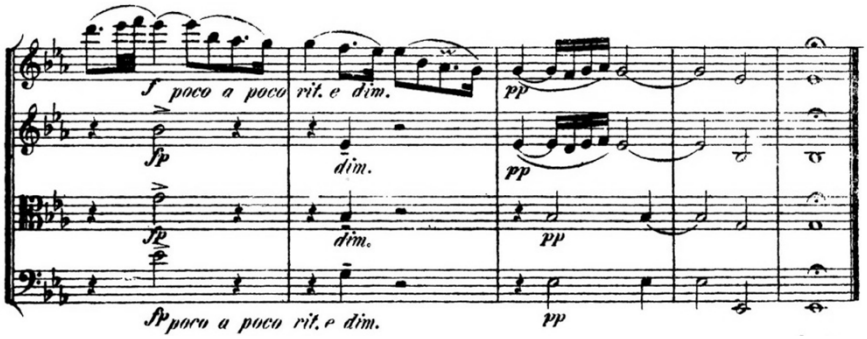
192

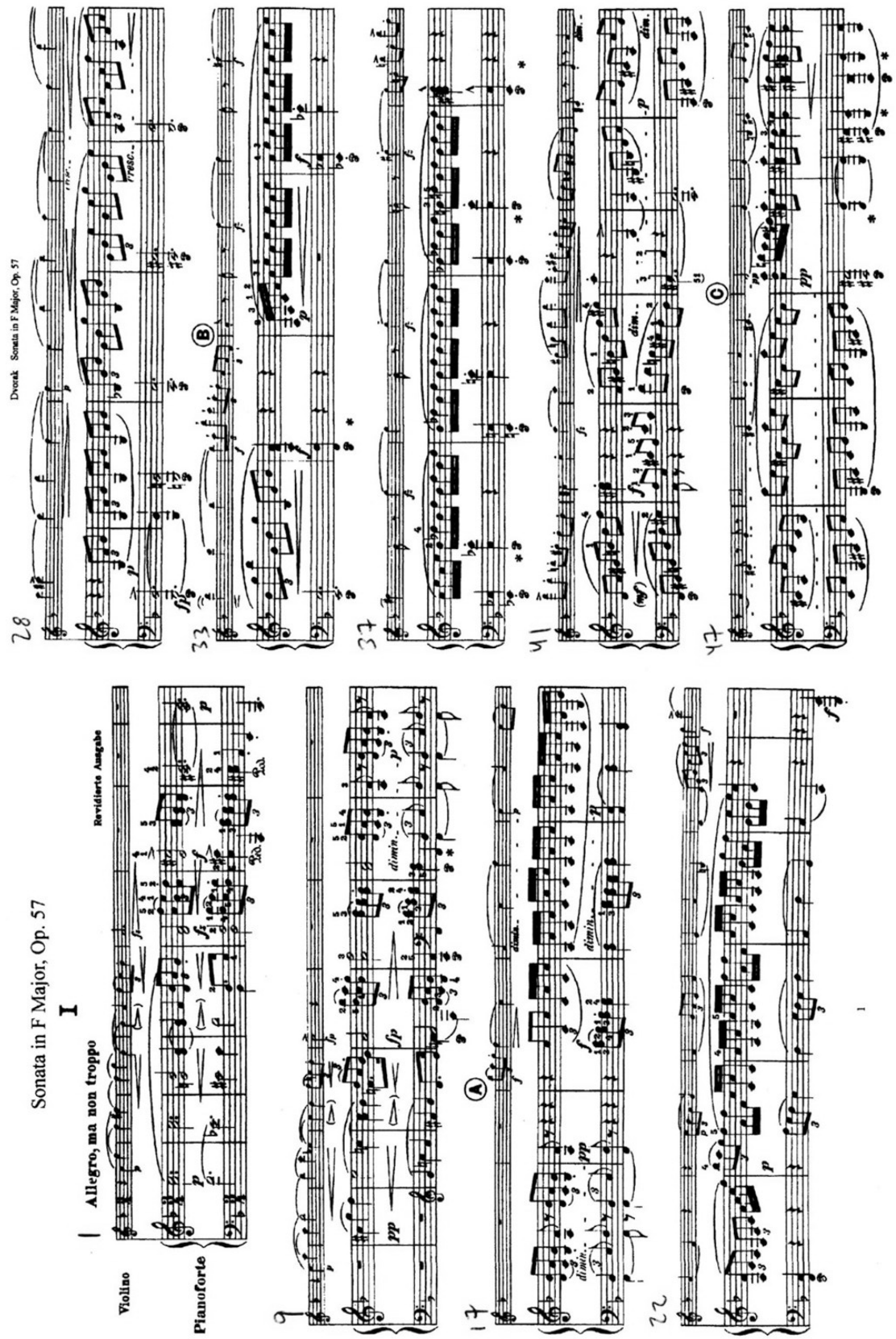


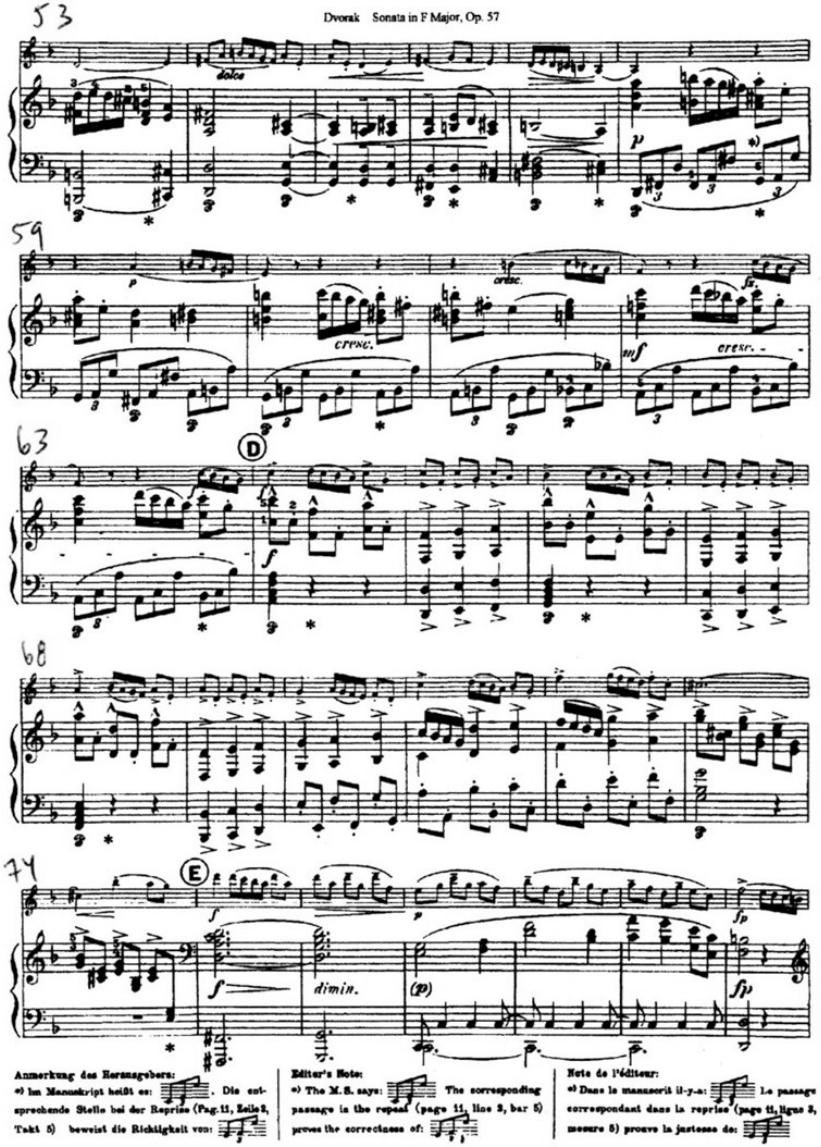
195

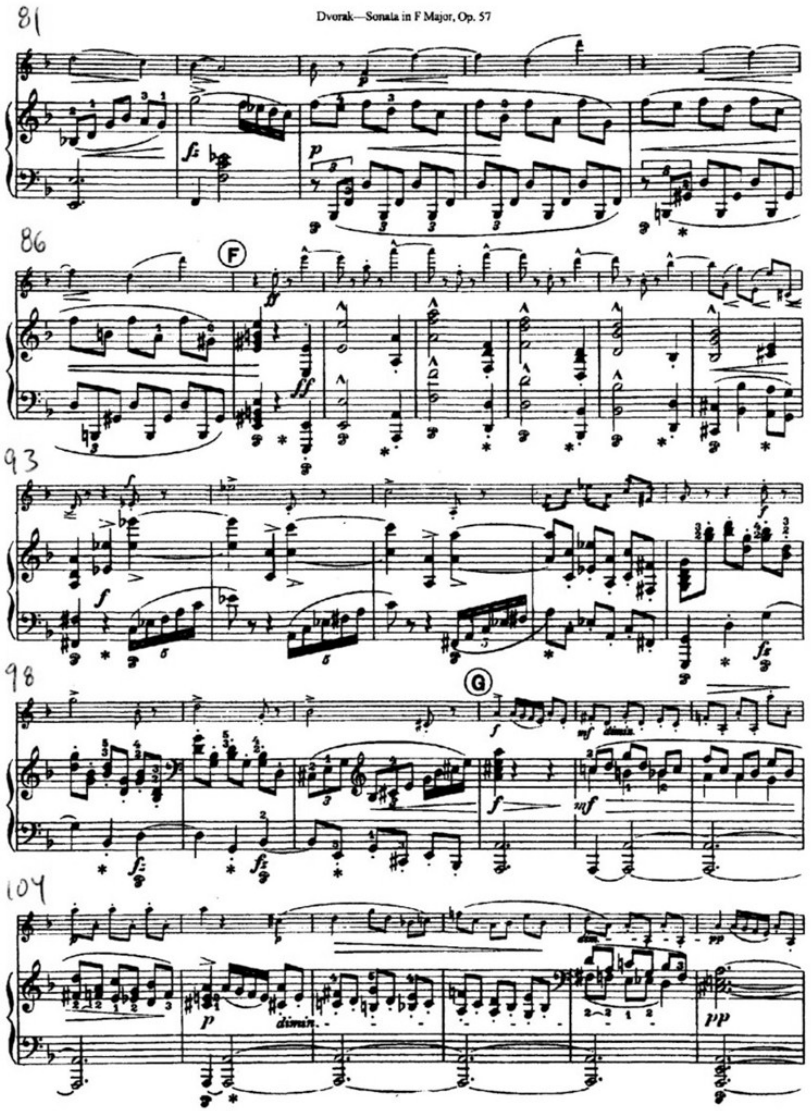


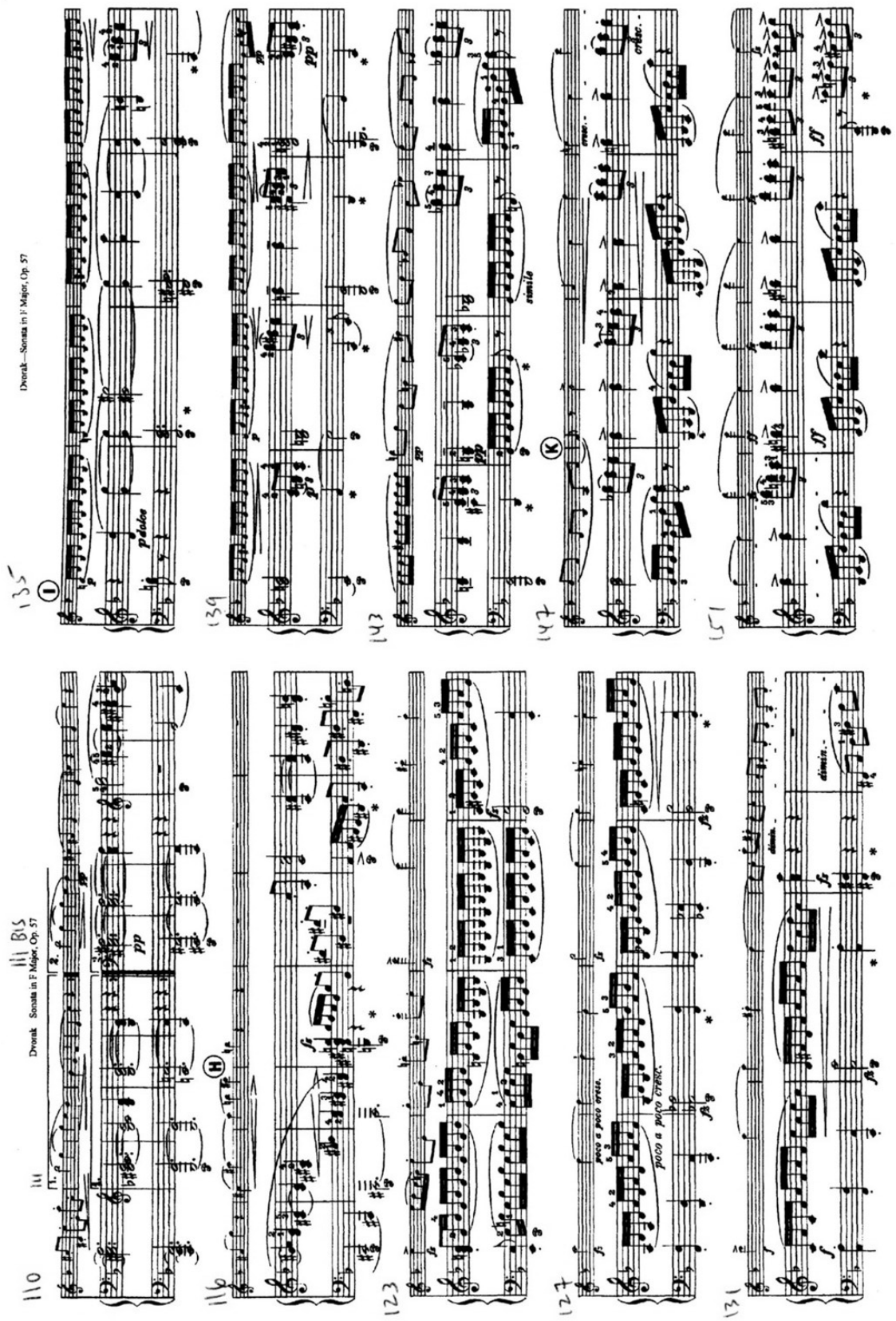
198

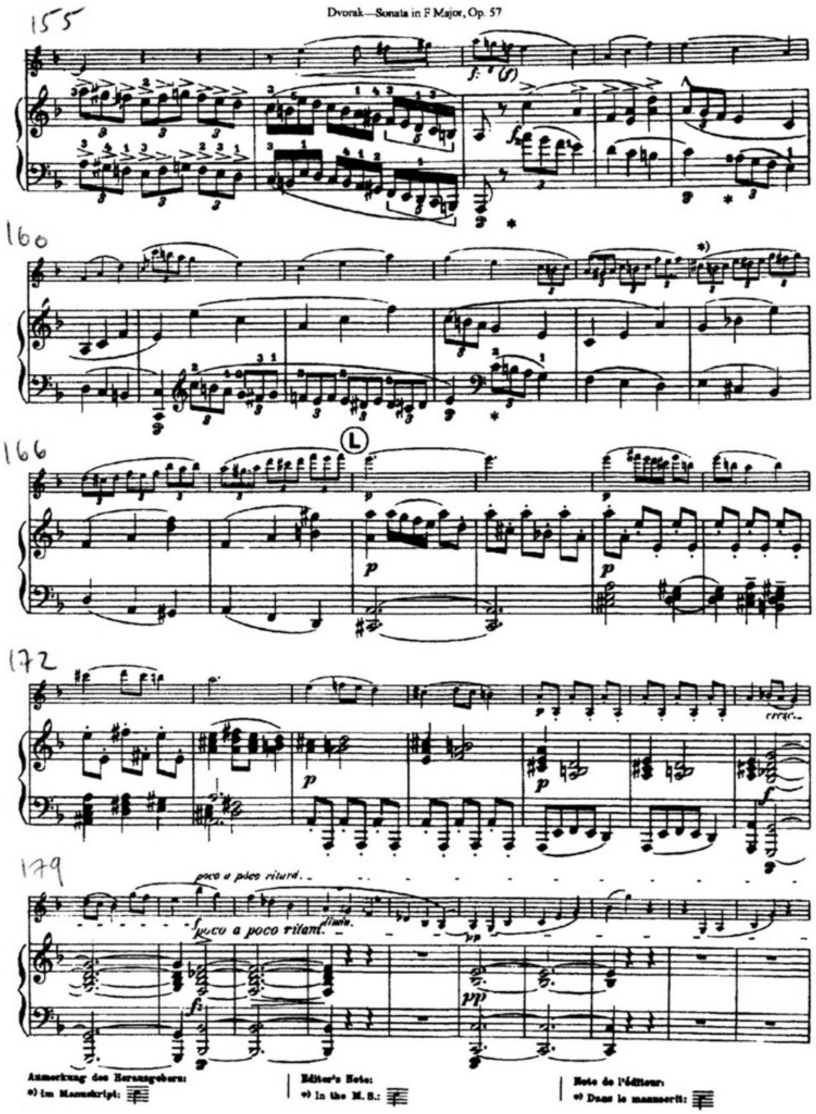



Sonata in F Major, Op. 57
I
Allegro, ma non troppo
Revidierte Ausgabe
Violino
Pianoforte
Dvorak Sonata in F Major, Op. 57

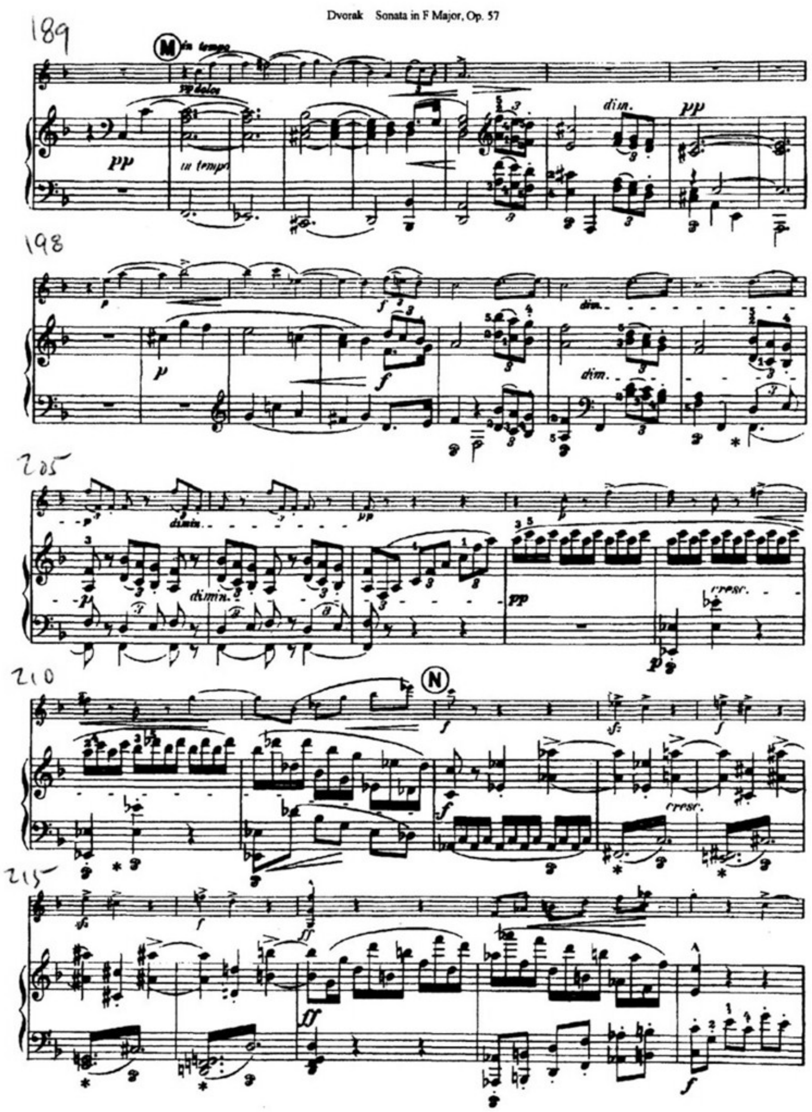

Dvorak Sonata in F Major, Op. 57
53
dolce
59
cresc.
63
D
68
74
E
dimin.
Anmerkung des Herausgebers:
*) Im Manuskript heißt es: . Die entsprechende Stelle bei der Reprise (Pag. 11, Zeile 2, Takt 5) beweist die Richtigkeit von:
Editor's Note:
*) The M.S. says: . The corresponding passage in the repeat (page 11, line 2, bar 5) proves the correctness of:
Note de l'éditeur:
*) Dans le manuscrit il y a: . Le passage correspondant dans la reprise (page 11, ligne 2, mesure 5) prouve la justesse de:


Dvorak—Sonata in F Major, Op. 57
81
86
F
93
98
G
104
dimin.

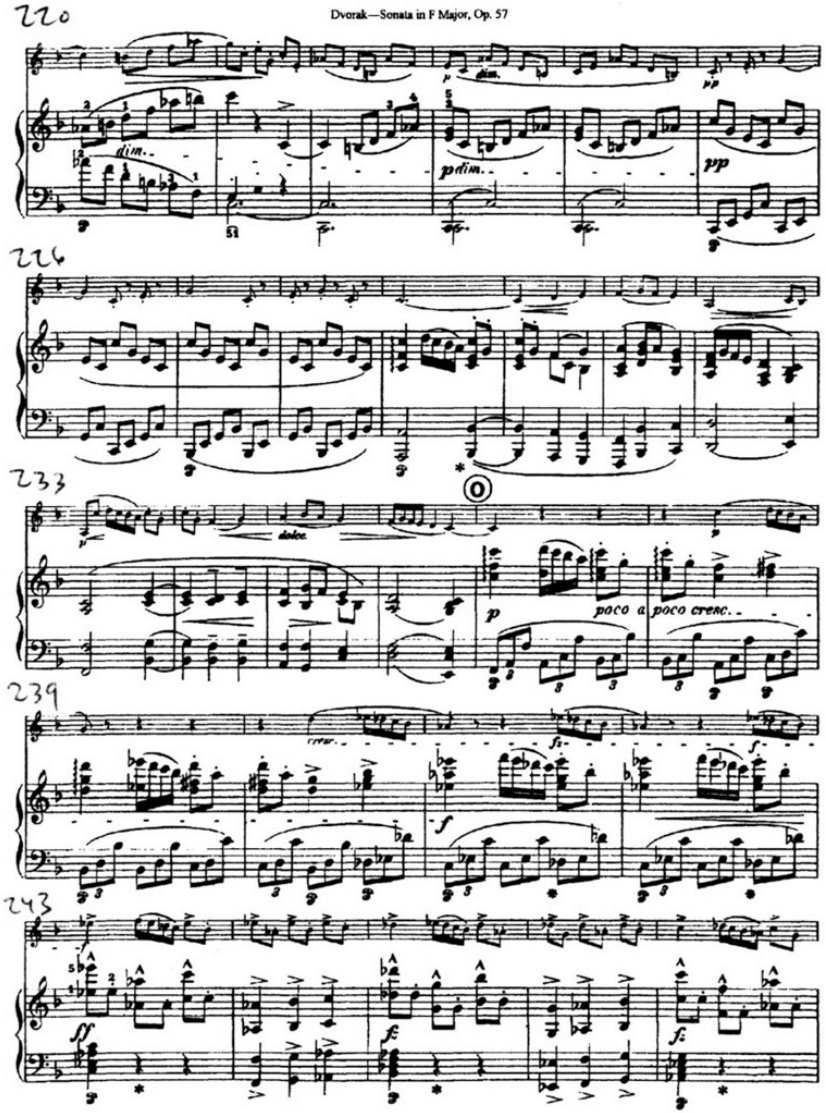

Dvorak—Sonata in F Major, Op. 57
Dvorak Sonata in F Major, Op. 57
poco a poco cresc.
dimin.

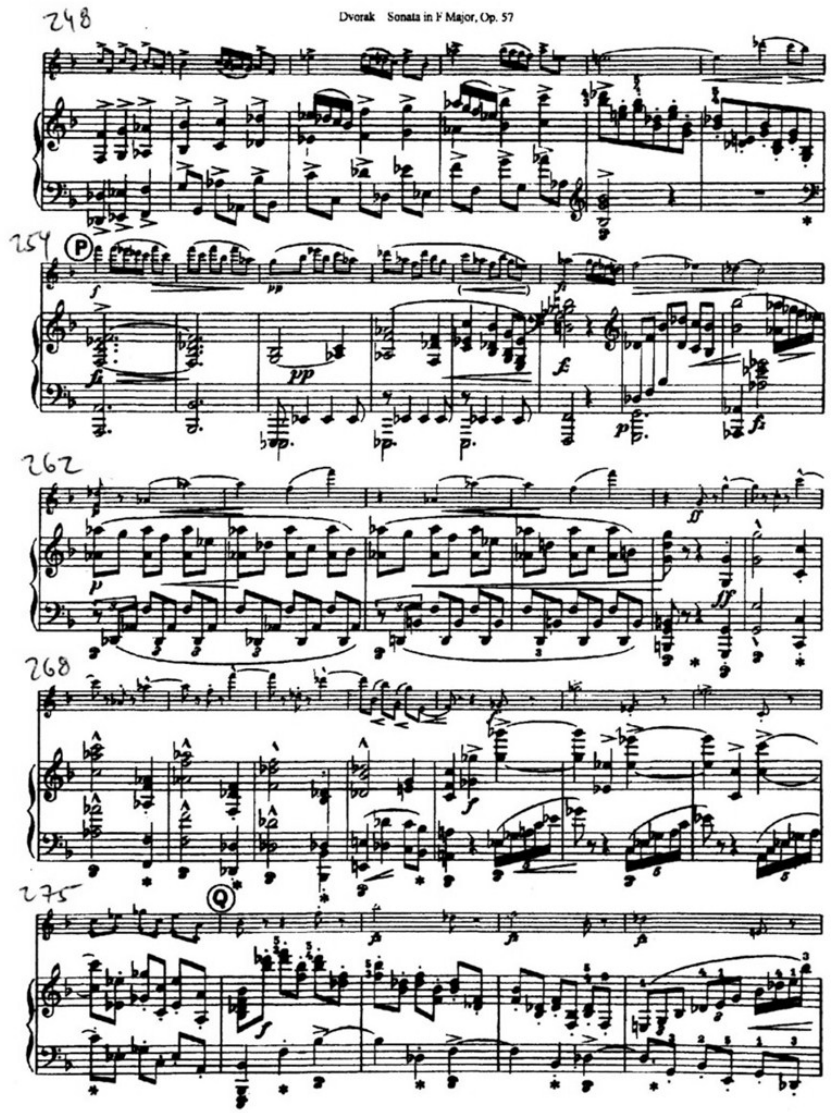


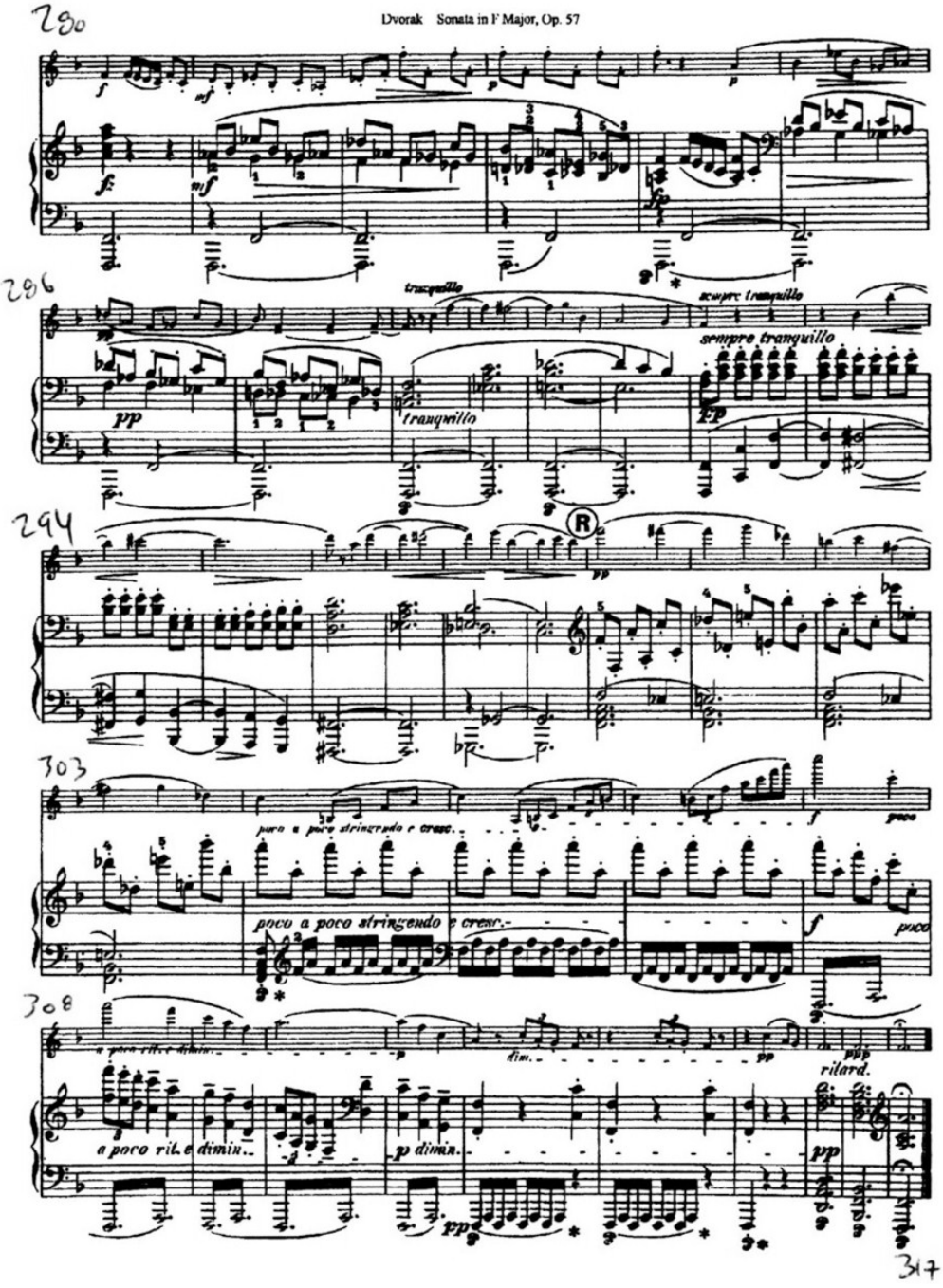
Dvorak—Sonata in F Major, Op. 57
155
160
166
L
172
179
poco a poco ritard.
poco a poco ritard. dimin.
Anmerkung des Herausgebers:
*) Im Manuskript:
Editor's Note:
*) In the M.S.:
Note de l'éditeur:
*) Dans le manuscrit:



Dvorak Sonata in F Major, Op. 57
189
M
in tempo
dolce
in tempo
dim.
198
dim.
205
dimin.
cresc.
210
N
cresc.
215


220
dim.
pdim.
pp
226
233
dolce
poco a poco cresc.
239
cresc.
243

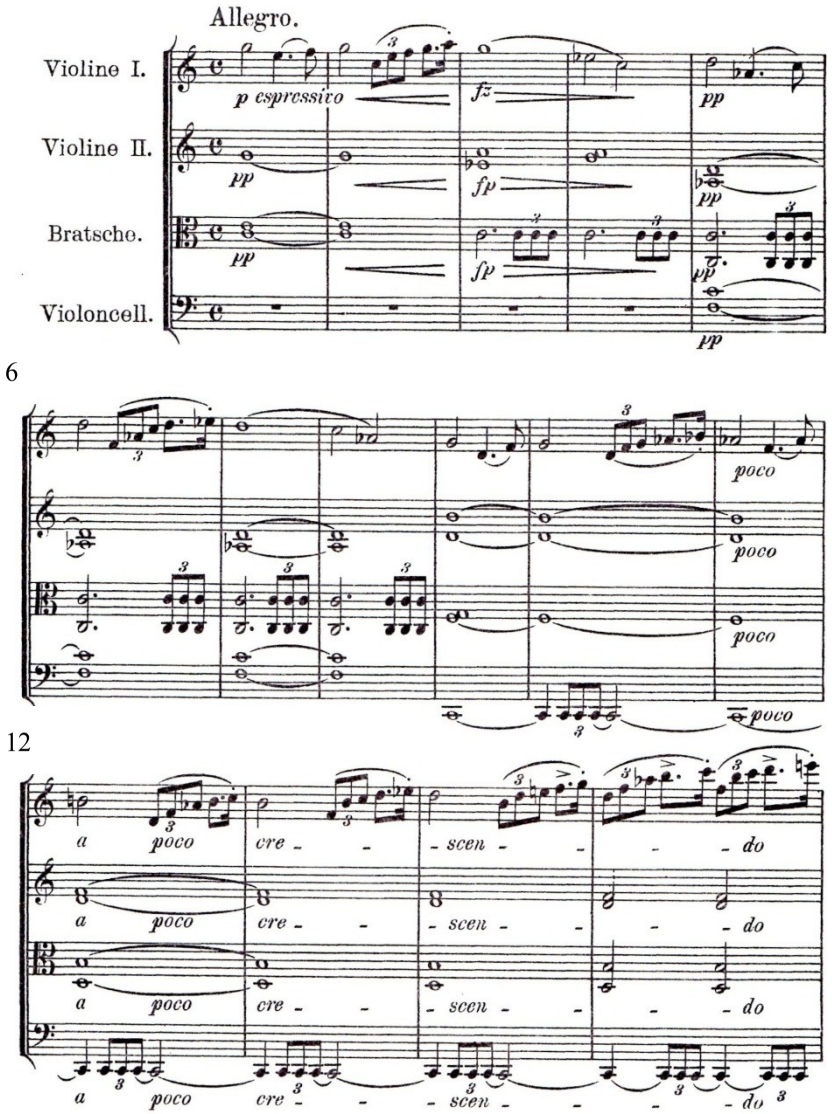

248
254
262
268
275

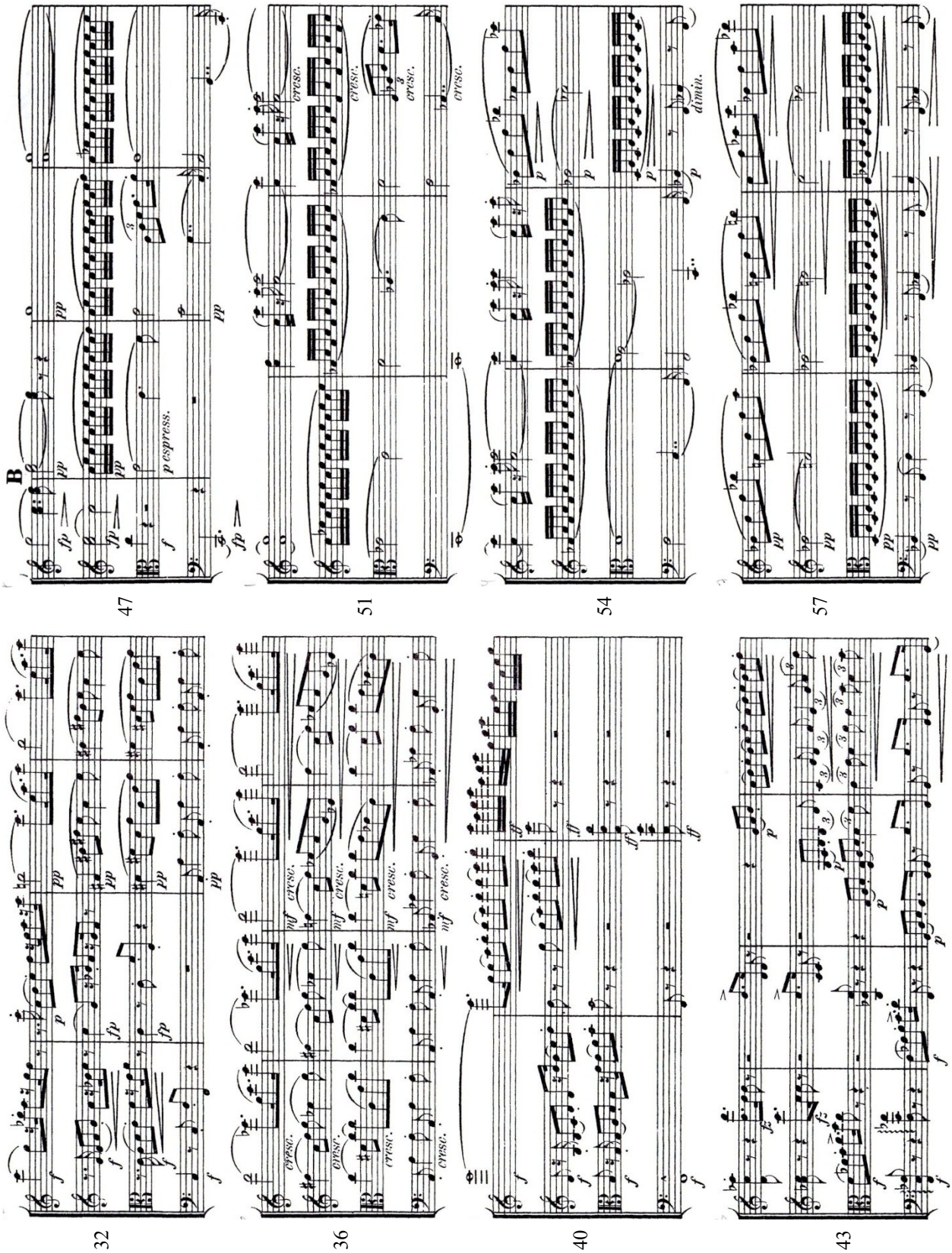

290
Dvorak Sonata in F Major, Op. 57
296
tranquillo
sempre tranquillo
294
303
poco a poco stringendo e cresc.
308
a poco rit. e dimin.
rilard.
317

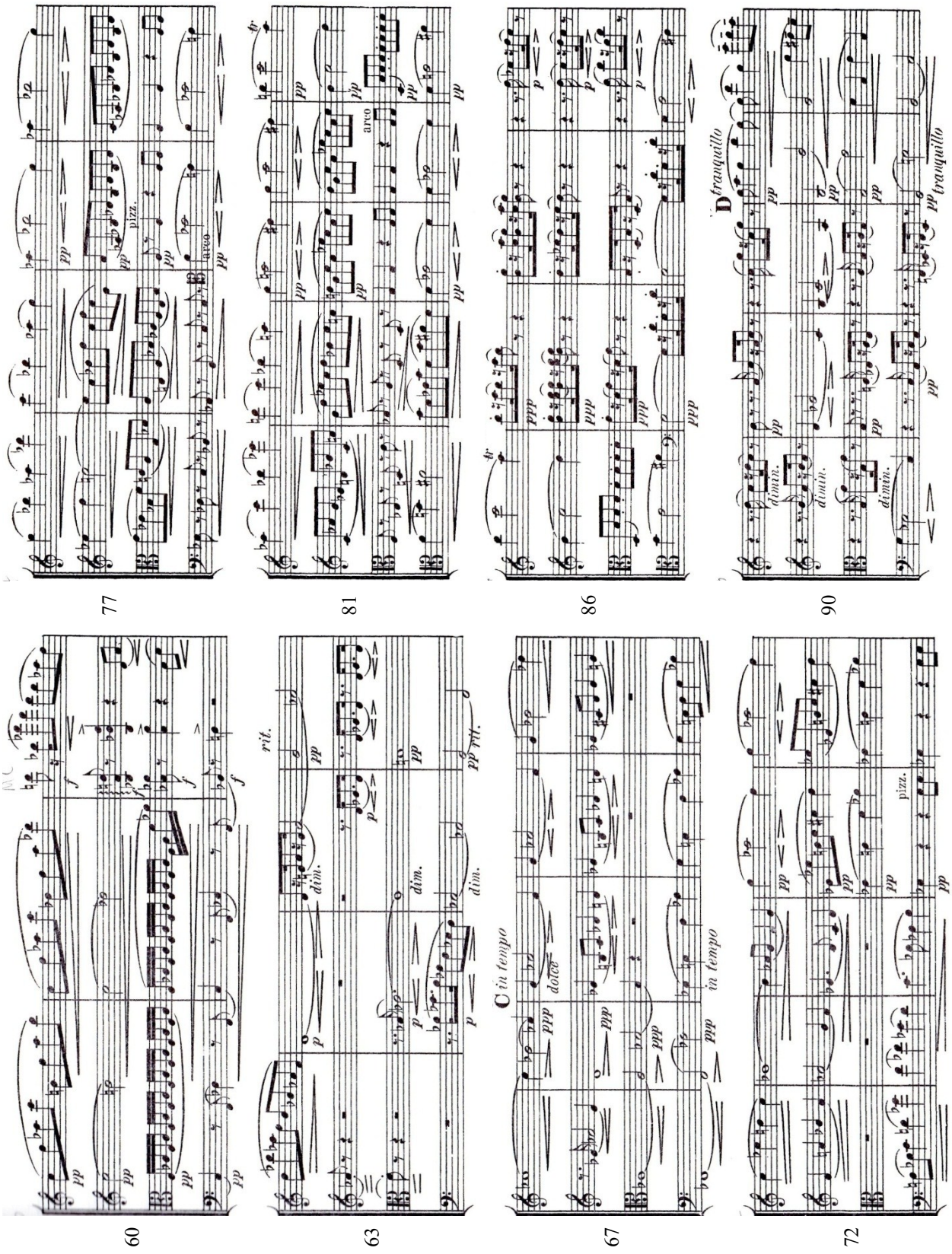
Quartet No. 11 in C Major, Op. 61

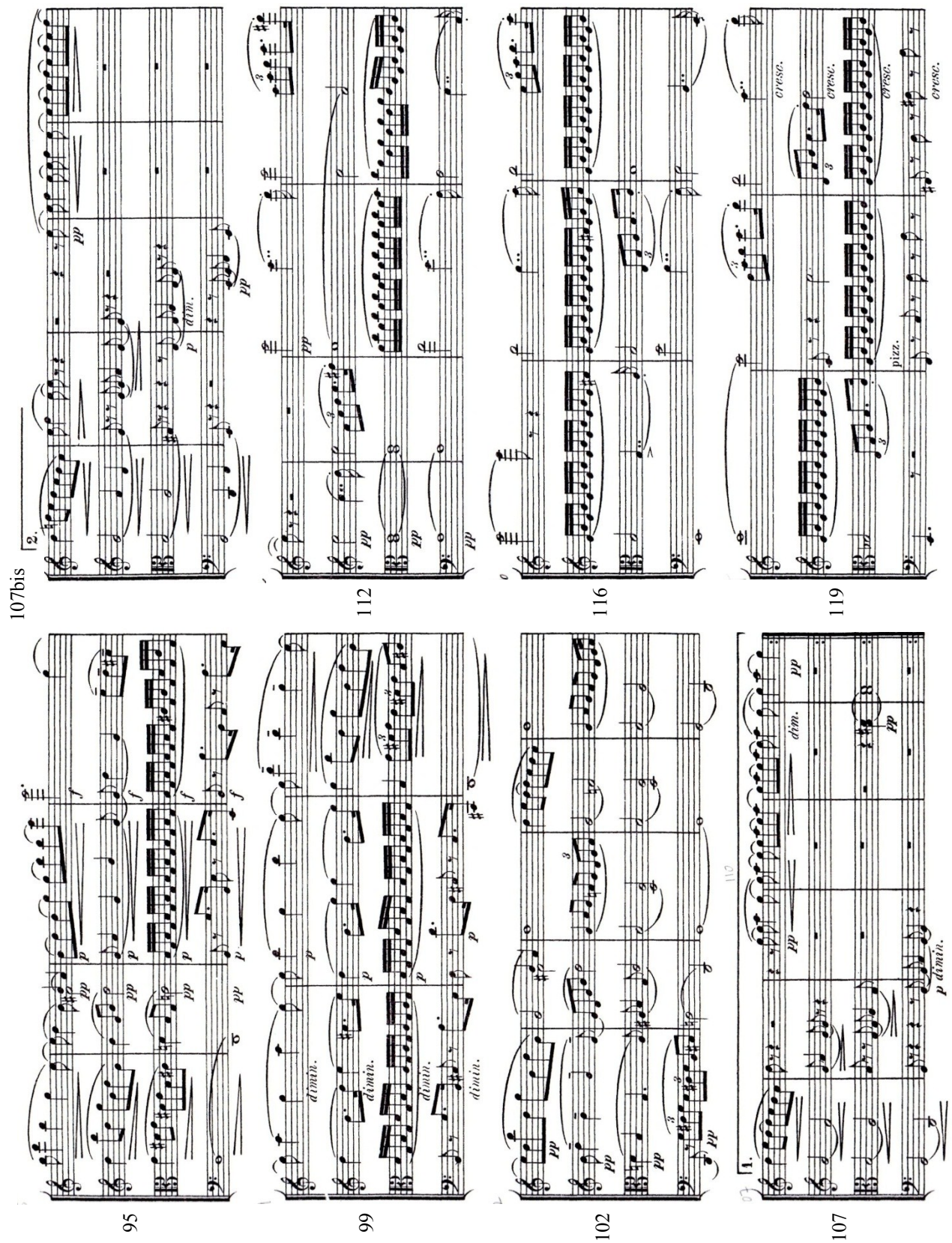
I.

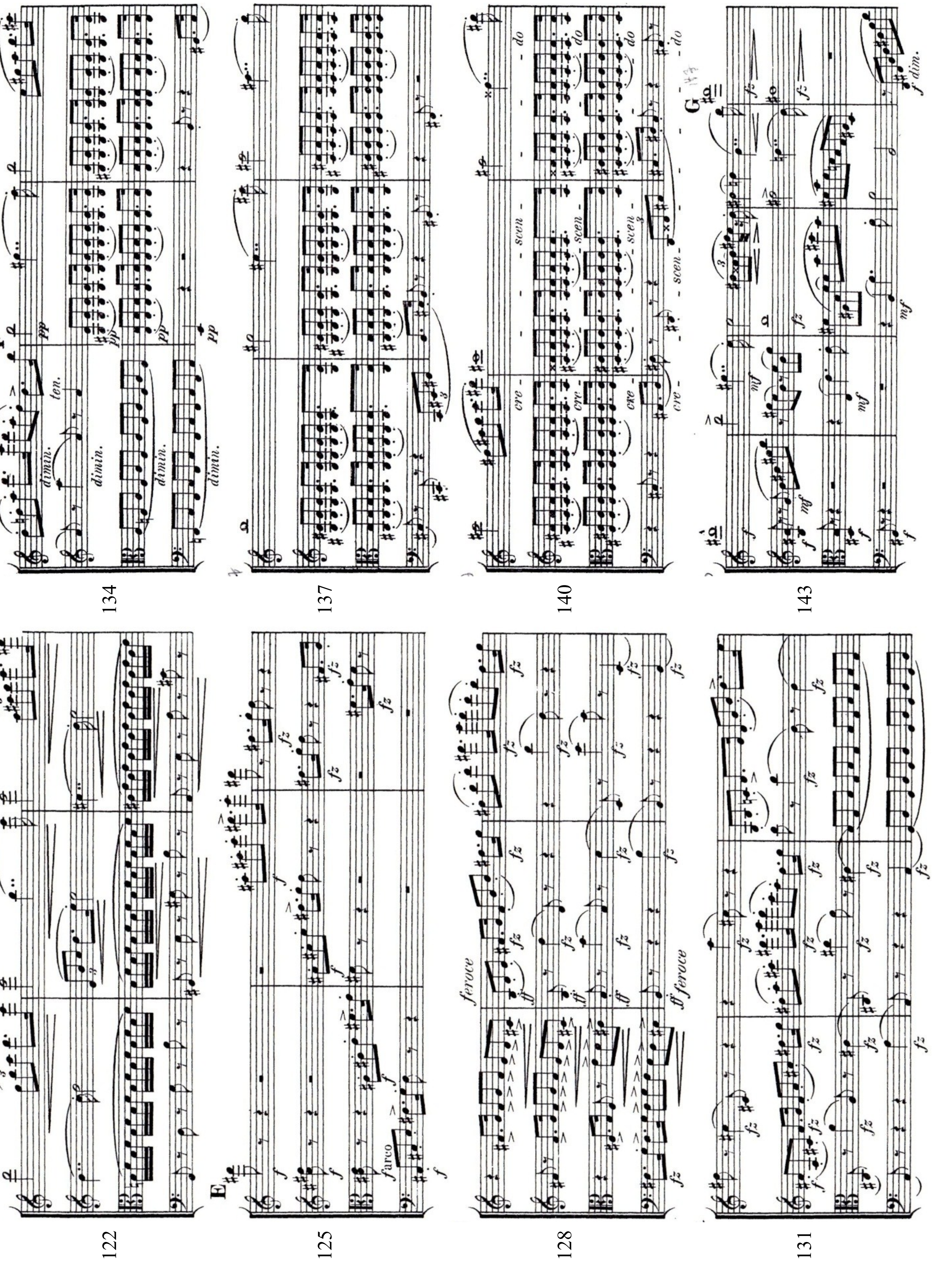
1881

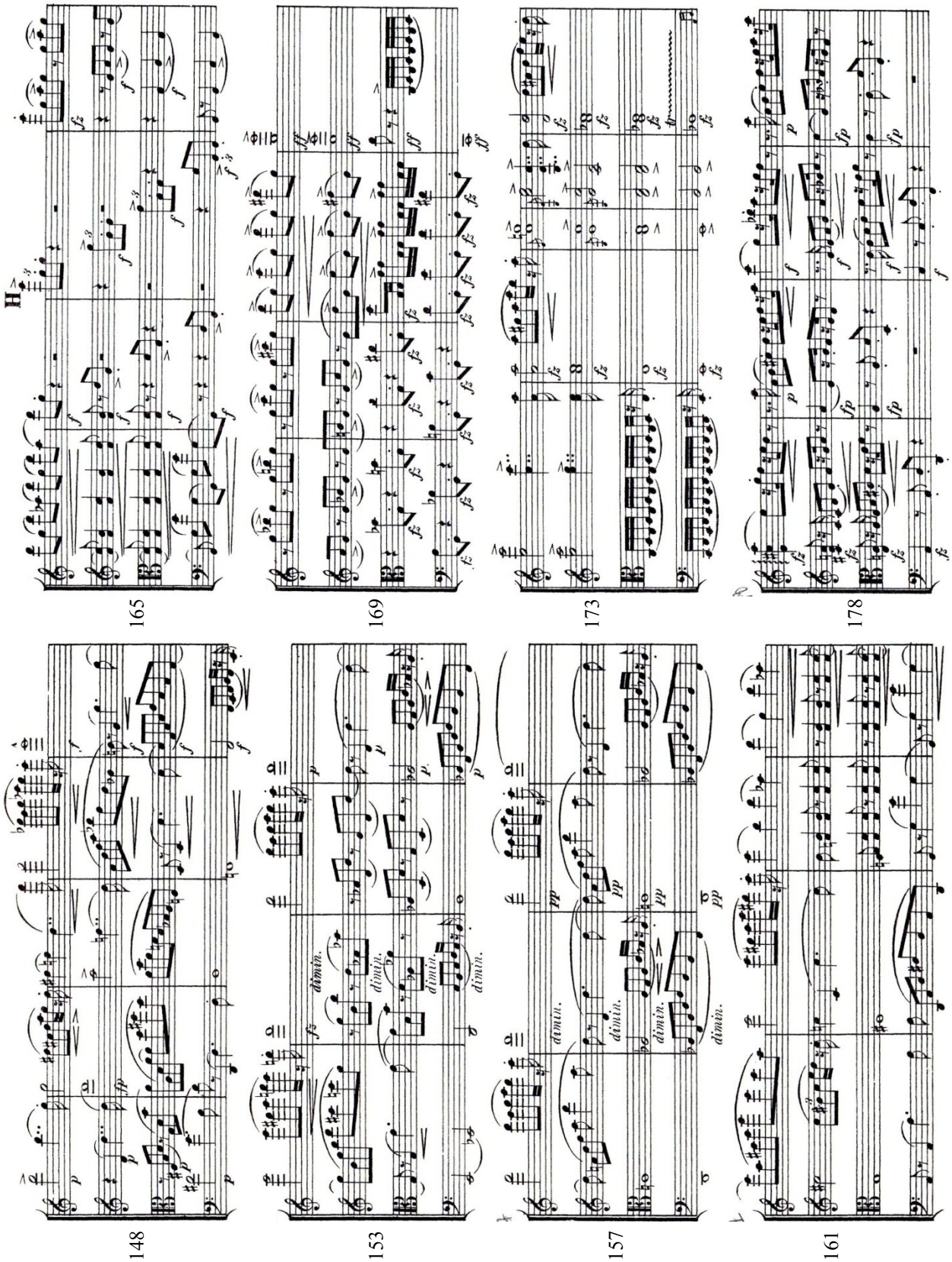



B
p espress.
cresc.
dimin.
32
36
40
43
47
51
54
57

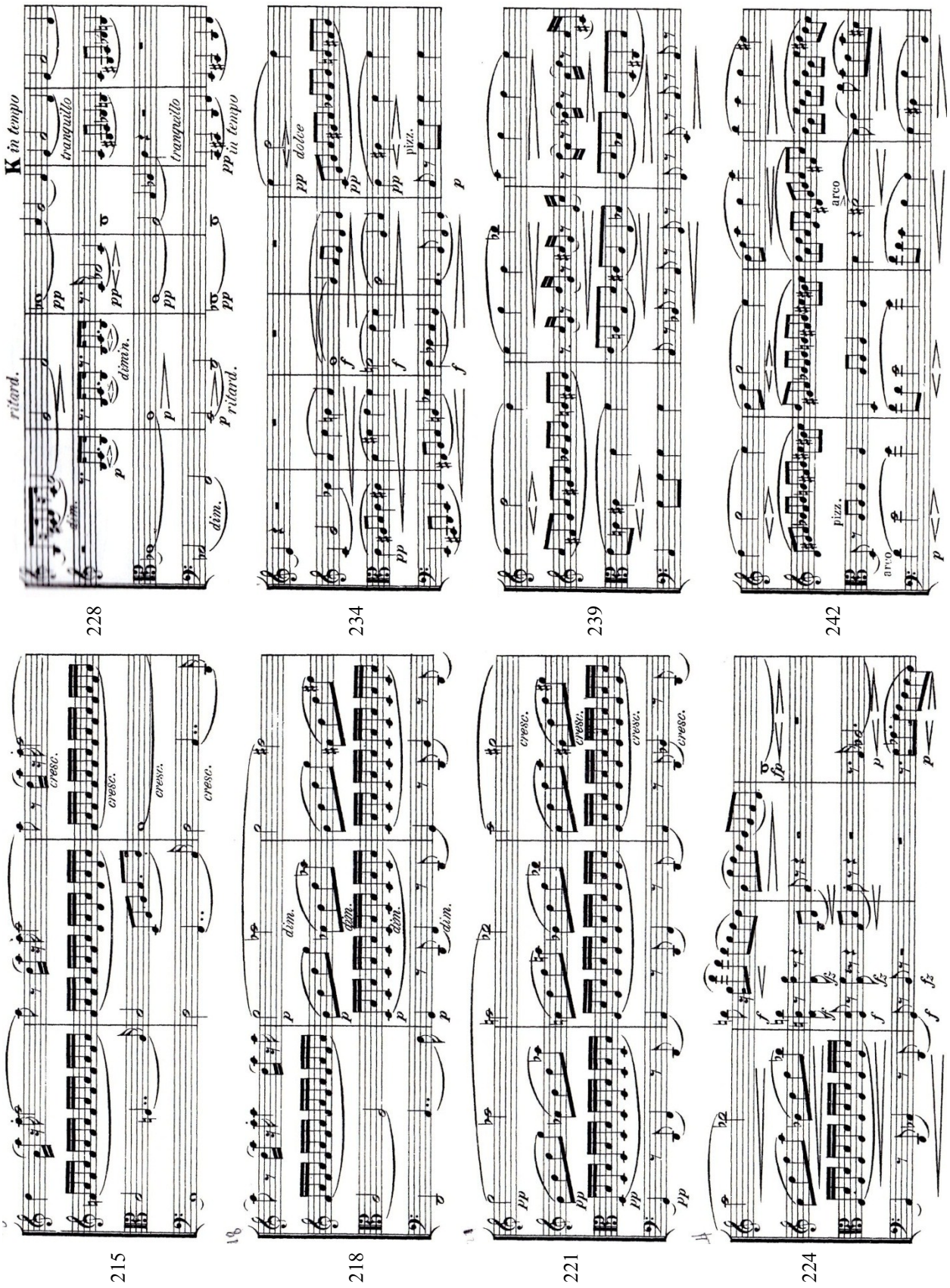

60
63
67
72
77
81
86
90
C in tempo
dolce
in tempo
rit.
dim.
pizz.
arco
D tranquillo
tranquillo

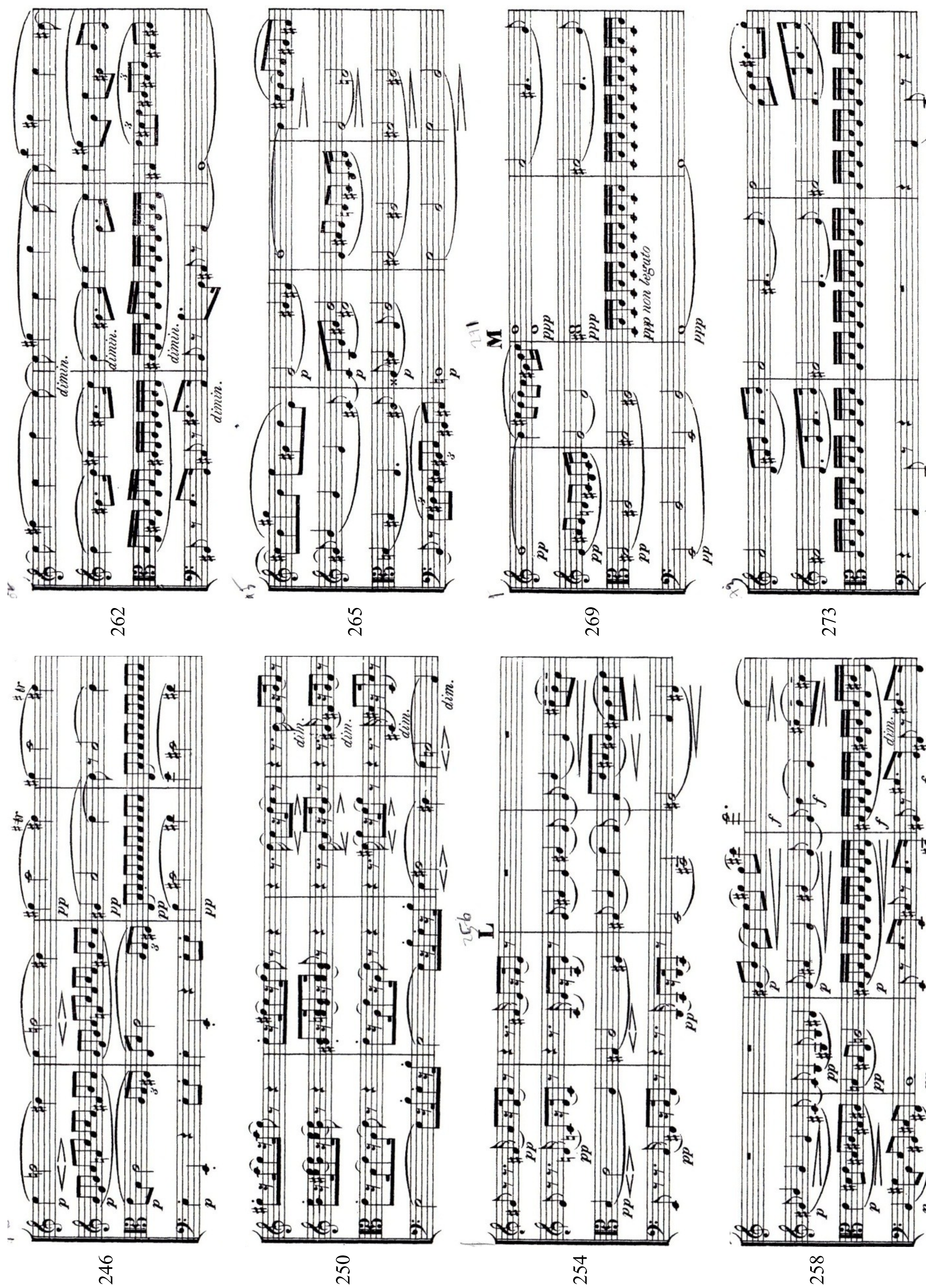

95
99
102
107
107bis
112
116
119
dimin.
dim.
cresc.
pizz.
p dimin.

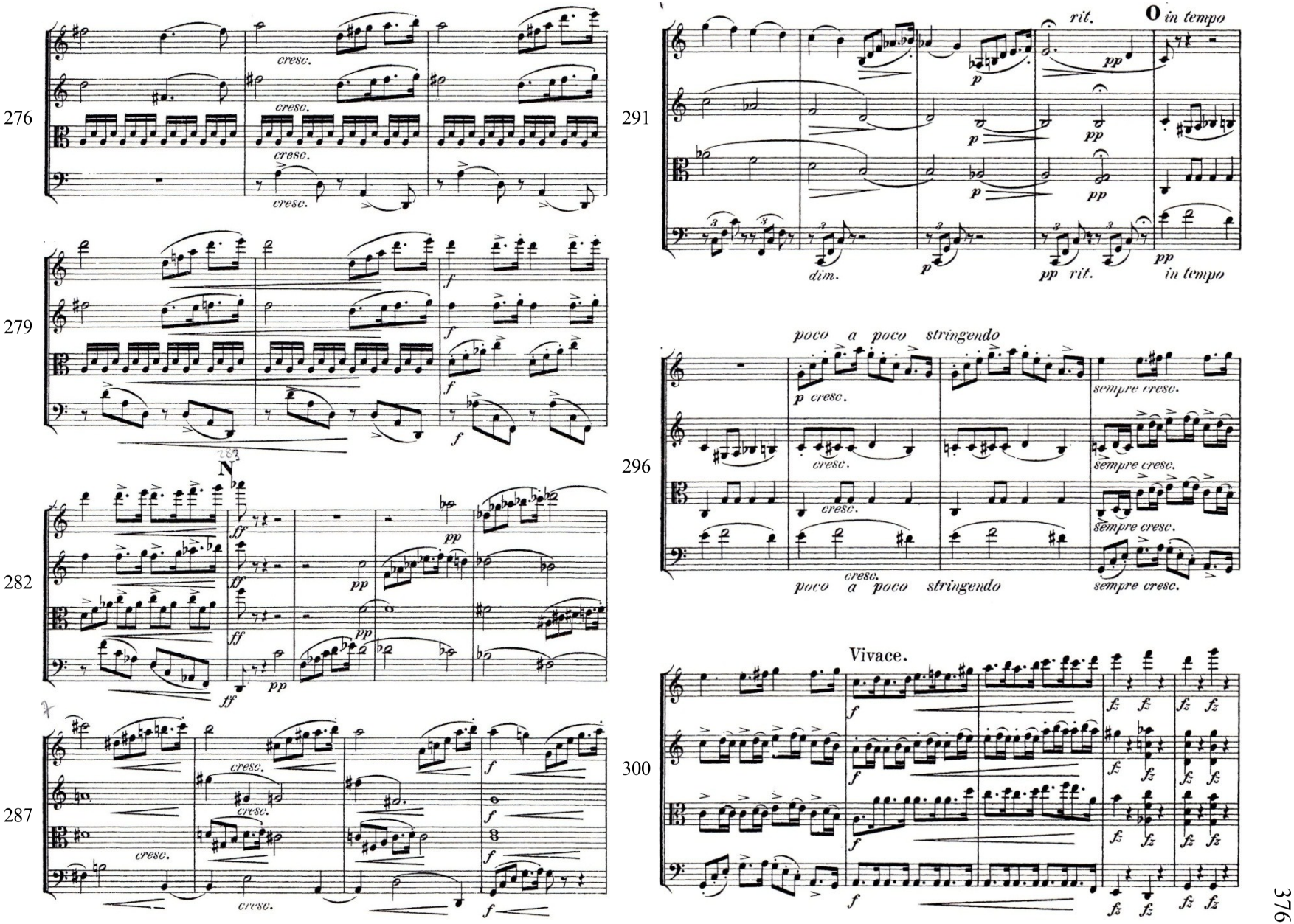

122
125
128
131
134
137
140
143
E
F
G
arco
feroce
ten.
dimin.
pp
cre - scen - do
mf
dim.

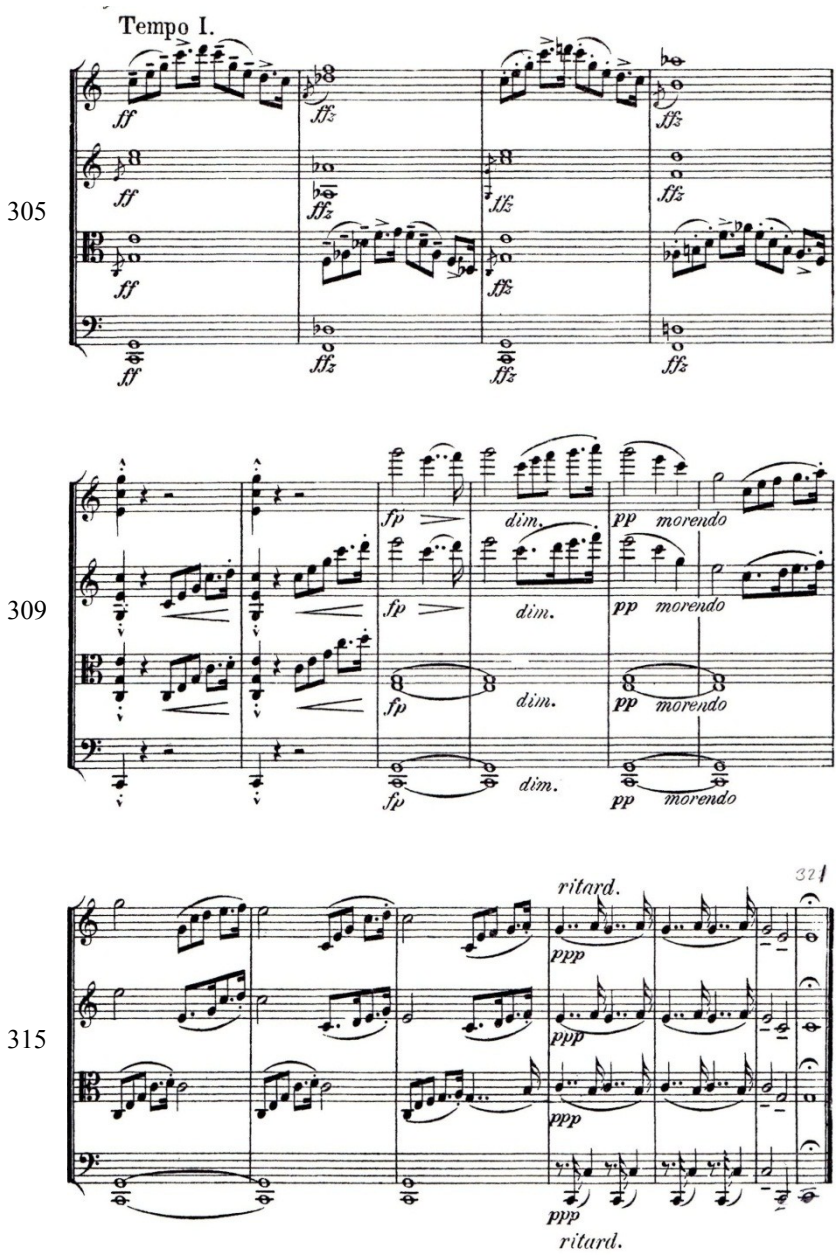

H
148
153
157
161
165
169
173
178
dimin.

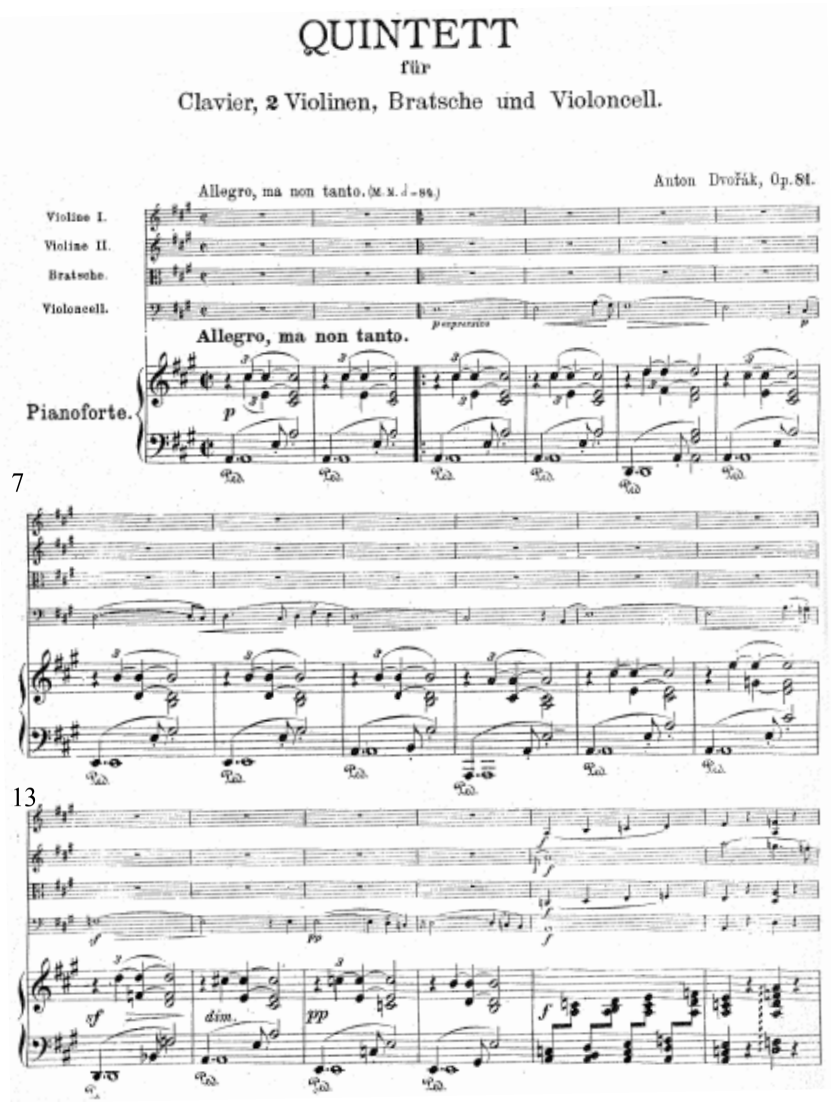

182
186
190
194
198
202
207
212
ritard.
in tempo
dimin.
pizz.
arco
cresc.
dim.
scen - do

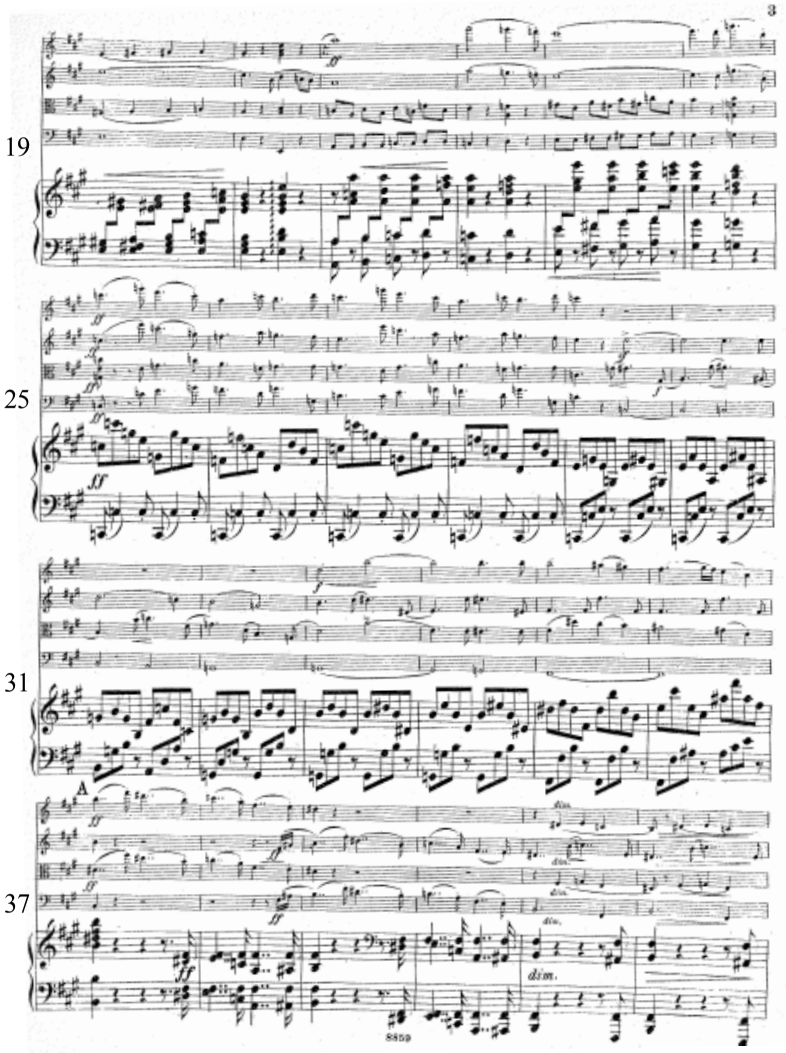

215
218
221
224
228
234
239
242
K in tempo
ritard.
tranquillo
dimin.
pp in tempo
cresc.
dim.
pp dolce
pizz.
arco


246
250
254
258
262
265
269
273
L
M
dimin.
dim.
cresc.
ppp non legato


276
cresc.
279
f
282
N
ff
pp
287
cresc.
f
291
rit.
O in tempo
p
pp
dim.
pp rit.
in tempo
296
poco a poco stringendo
p cresc.
sempre cresc.
300
Vivace.
fz


Tempo I.
305
309
315
ritard.
ritard.


QUINTETT
für
Clavier, 2 Violinen, Bratsche und Violoncell.
Anton Dvořák, Op. 81.
Allegro, ma non tanto. (M. M. ♩ = 84.)
Violine I.
Violine II.
Bratsche.
Violoncell.
Allegro, ma non tanto.
Pianoforte.
7
13
dim.
pp

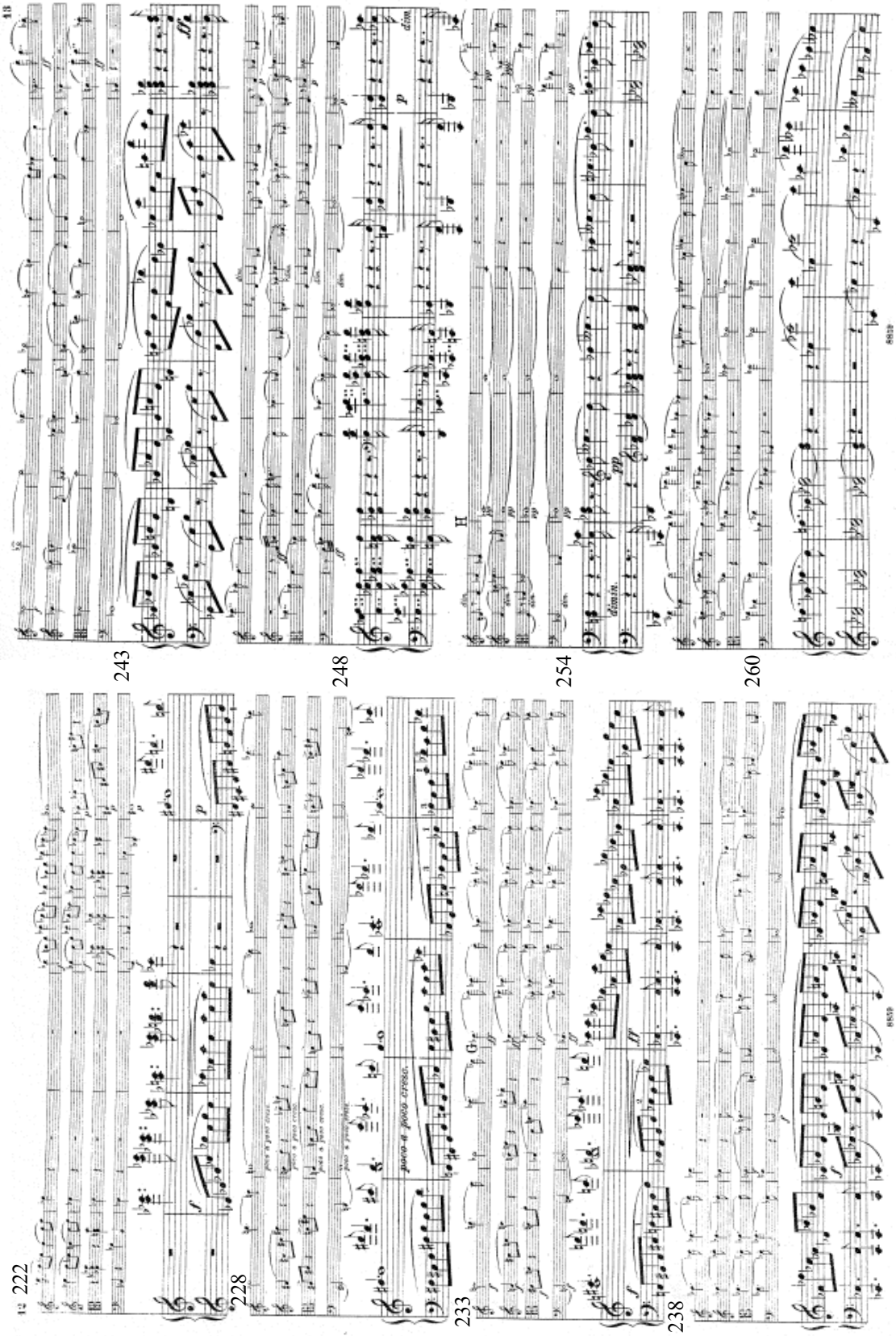

3
19
25
31
A
37
dim.

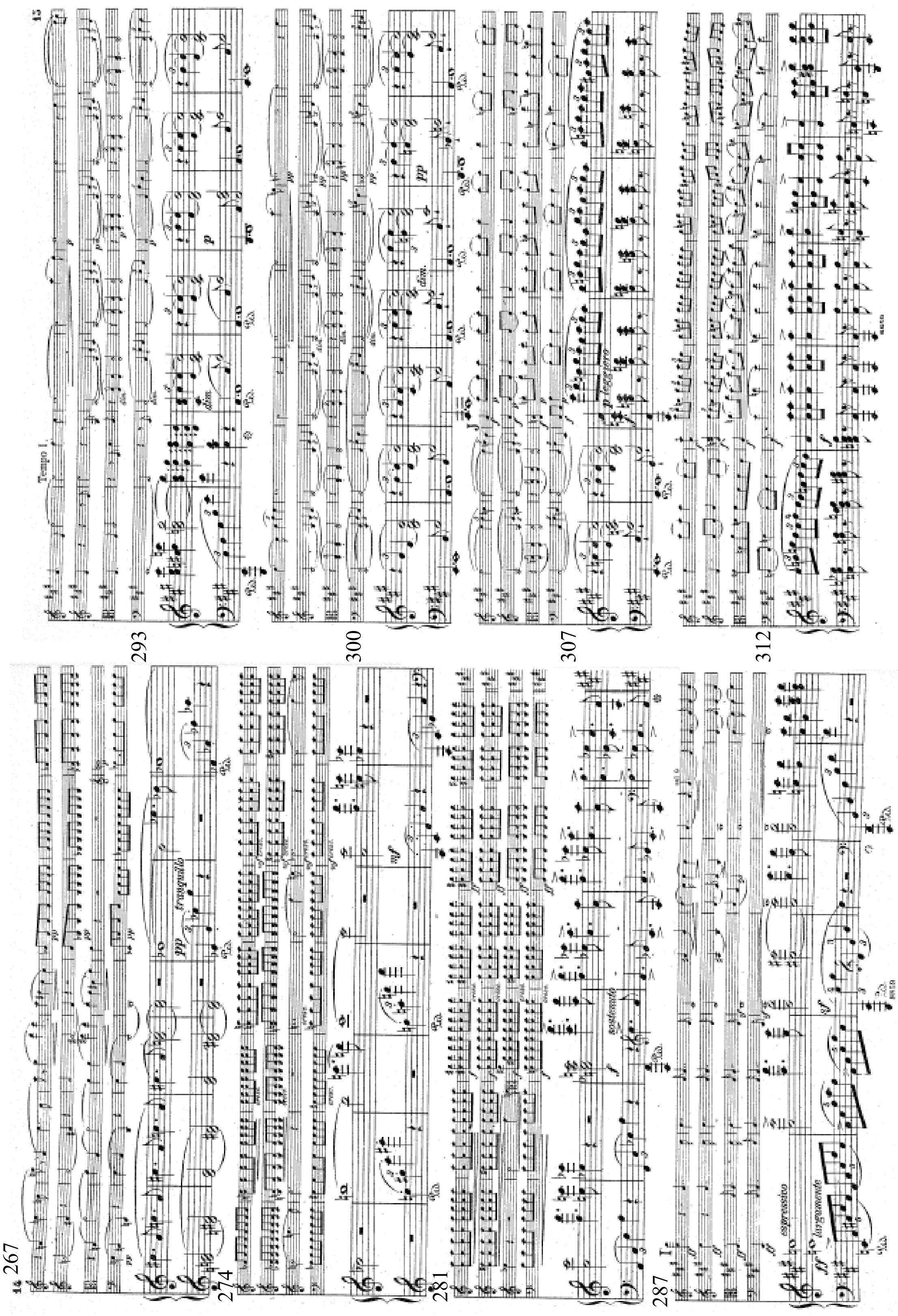

43
50
57
64
70
76
80
84
B
C
8859


89
96
102
108
113
118
125
131

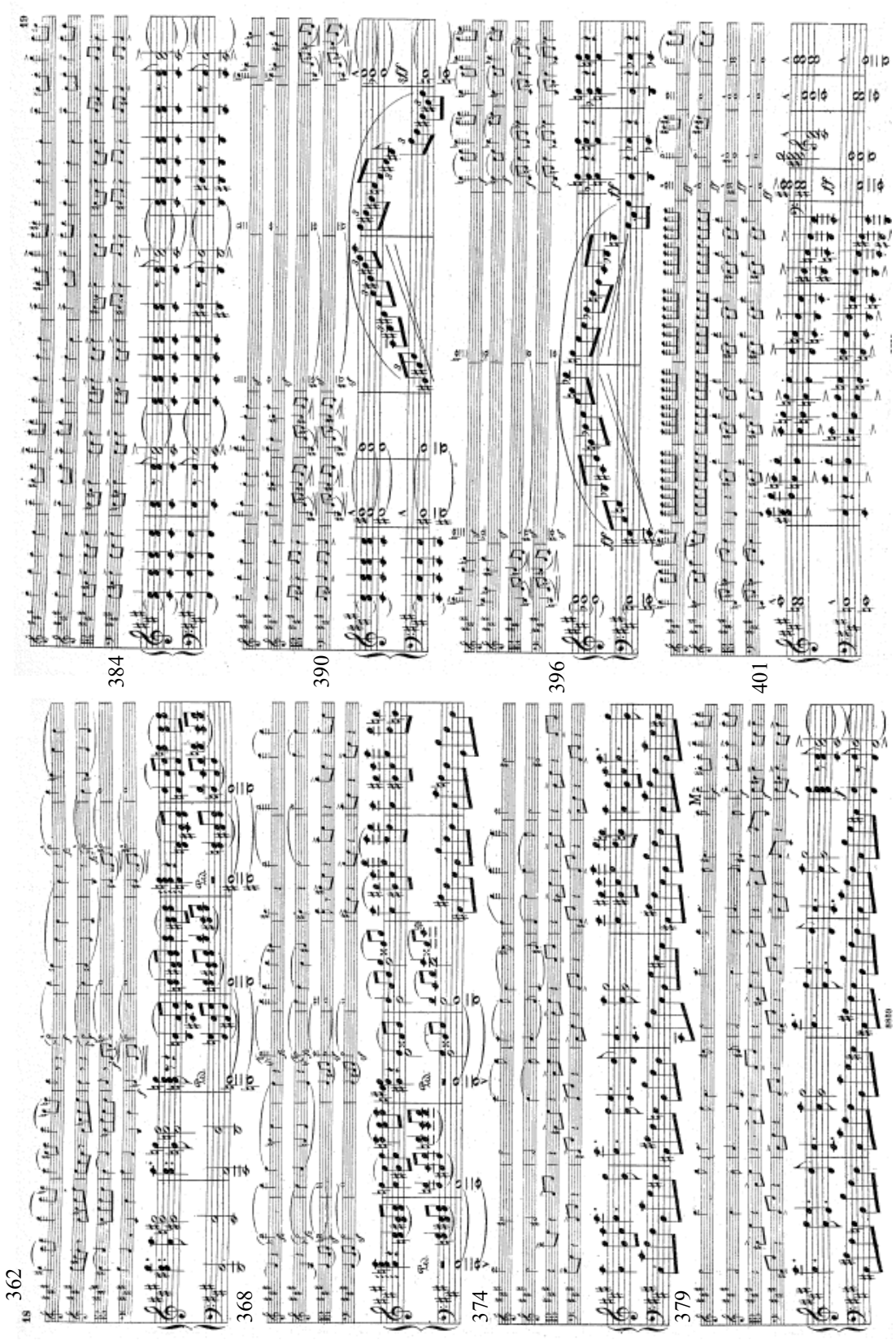

137
143
149
153bis
155
154
160
166
173
E
p tranquillo

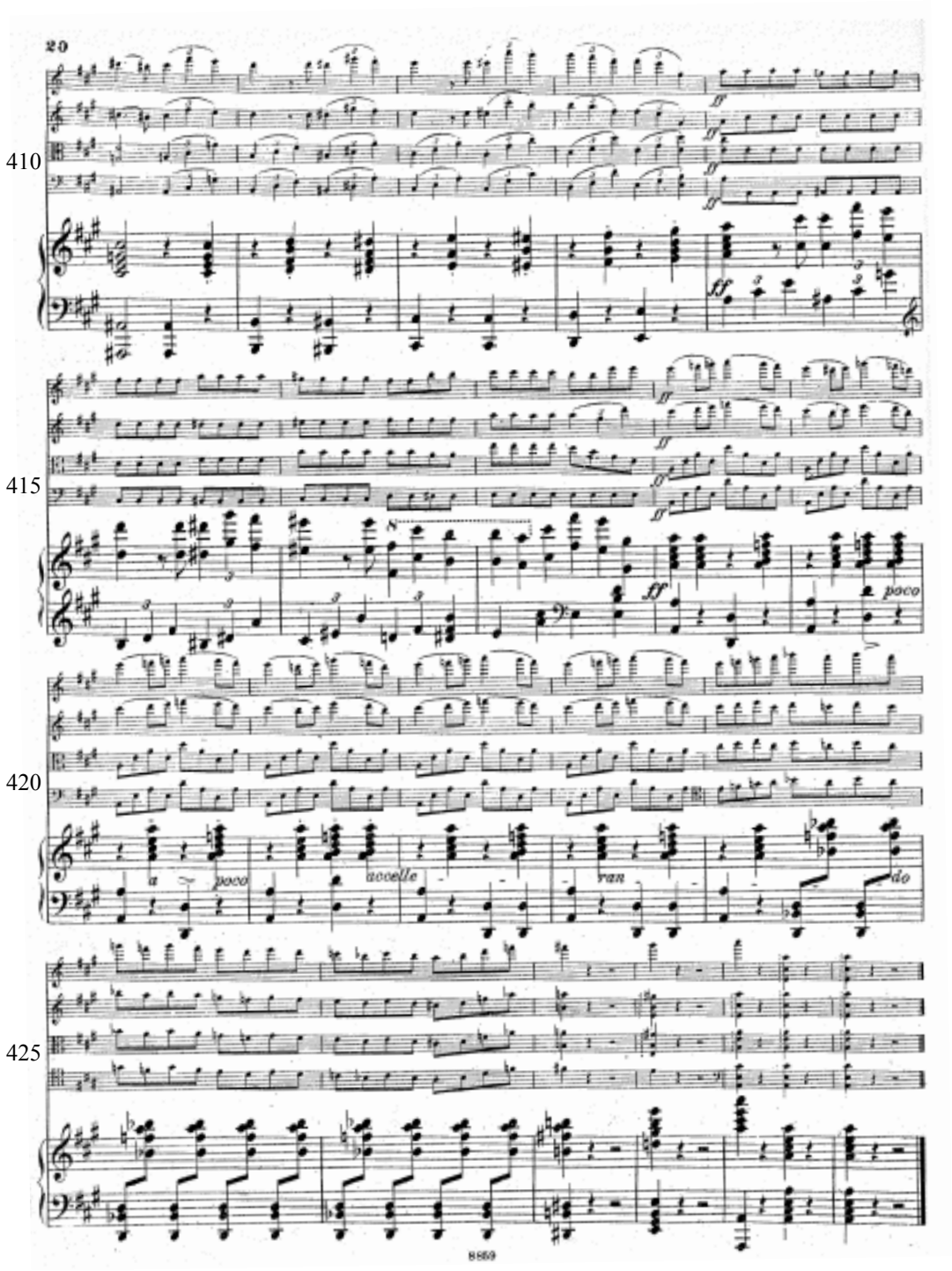

179
184
189
194
199
205
210
216


222
228
233
238
243
248
254
260
H
G


267
274
281
287
293
300
307
312
Tempo I.
tranquillo
sostenuto
espressivo
largamente
leggiero
dim.


317
321
327
333
338
344
349
355


362
368
374
379
384
390
396
401


20
410
415
420
425
poco
accelle
ran
do
8869

Bibliography

Abraham, Gerald. "Dvořák's Musical Personality." In *Antonín Dvořák: His Achievement*, edited by Viktor Fischl, 192–240. London: Drummond, 1943. Reprint, Westport, CT: Greenwood Press, 1970.

———. "Verbal Inspiration in Dvořák's Instrumental Music." *Studia Musicologica Academiae Scientarium Hungaricae* 11, no. 1/4, Bence Szabolsci, Septuagenerio (1969): 27–34.

Aldwell, Edward and Carl Schachter. *Harmony and Voice Leading*, 3rd ed. New York: Schirmer, 2002.

Anson-Cartwright, Mark. "Chord as Motive: the Augmented-Triad Matrix in Wagner's 'Siegfried Idyll.'" *Music Analysis* 15, no. 1 (March 1996): 57–71.

Babbitt, Milton. *Milton Babbitt: Words About Music*. Edited by Stephen Dembski. Madison: University of Wisconsin Press, 1987.

Bass, Richard. "Enharmonic Position Finding and the Resolution of Seventh Chords in Chromatic Music." *Music Theory Spectrum* 29, no. 1 (Spring 2007): 73–100.

———. "Half-Diminished Functions and Transformations in Late Romantic Music." *Music Theory Spectrum* 23, no. 1 (Spring 2001): 41–60.

Beach, David. "The Cadential Six-Four as Support for Scale-Degree Three of the Fundamental Line." *Journal of Music Theory* 34, no. 1 (Spring 1990): 81–99.

———. "A Recurring Pattern in Mozart's Music." *Journal of Music Theory* 27, no. 1 (Spring 1983): 1–29.

Beckerman, Michael. "Dvořák and Brahms: A Question of Influence." *The American Brahms Society Newsletter* 4, no. 2 (Autumn 1986): 6–8.

Beckerman, Michael, ed. *Dvořák and His World*. Princeton: Princeton University Press, 1993.

Beckerman, Michael. "In Search of Czechness in Music." *19th-Century Music* 10, no. 1 (Summer 1986): 61–73.

———. *New Worlds of Dvořák*. New York: Norton, 2003.

Bennett, Joseph. "Anton Dvořák." *Musical Times* 25, no. 494 (Spring 1884): 189–192.

———. "The Music of Anton Dvořák." *Musical Times* 22, no. 458 (Spring 1881): 165–69, and *Musical Times* 22, no. 459 (Spring 1881): 236–39.

Bernstein, David W. and Christopher Hatch, eds. *Music Theory and the Exploration of the Past*. Chicago: University of Chicago Press, 1993.

Bernstein, David W. "Nineteenth-century Harmonic Theory: the Austro-German legacy." In *The Cambridge History of Western Music Theory*, edited by Thomas Christensen, 778–811. New York: Cambridge University Press, 2002.

Beveridge, David. "Dvořák and Brahms: A Chronicle, An Interpretation." In *Dvořák and His World*, edited by Michael Beckerman, 56 – 91. Princeton: Princeton University Press, 1993.

———. "Dvořák's Piano Quintet, op. 81: the Schumann Connection." *Chamber Music Quarterly* (Spring 1984): 2–10.

———. "Echoes of Dvořák in the Third Symphony of Brahms." *Musik des Ostens* 12 (1989): 221–30.

Beveridge, David, ed. *Rethinking Dvořák*. New York: Clarendon Press, 1996.

Beveridge, David. *Romantic Ideas in a Classical Frame: the Sonata Forms of Dvořák*. Ph.D. diss., University of California, Berkeley, 1980.

———. "Sophisticated Primitivism: the Significance of Pentatonicism in Dvořák's *American* Quartet." *Current Musicology* 24 (1977): 25–36.

Biamonte, Nicole. *The Modes in the Music of Beethoven, Schumann, and Brahms* .Ph.D. diss., Yale University, 2000.

Bloom, Harold. *The Anxiety of Influence: A Theory of Poetry*, 2nd ed. New York: Oxford University Press, 2007.

Boatwright, Howard and Ernst Oster. "Analysis Symposium: W. A. Mozart, Menuetto in D Major for Piano (K. 355)." *Journal of Music Theory* 10, no. 1 (Spring 1966): 18–52.

Bonds, Mark Evans. *After Beethoven*. Cambridge, MA: Harvard University Press, 1996.

Bribitzer-Stull, Matthew. "The A♭–C–E complex: The Origin and Function of Chromatic Major Third Collections in Nineteenth-Century Music." *Music Theory Spectrum* 28, no. 2 (Autumn 2006): 167–190.

Brillat-Savarin, Jean Anthelme. *The Physiology of Taste: Or, Meditations on Transcendental Gastronomy*. Translated by M.F.K. Fisher. New York: Penguin Classics, 1994.

Brodbeck, David, ed. *Brahms Studies* 1. Lincoln, NE: University of Nebraska Press, 1995.

Brodbeck, David. "Dvořák's Reception in Liberal Vienna: Language Ordinances, National Property, and the Rhetoric of *Deutschtum*." *Journal of the American Musicological Society* 60, no. 1 (Spring 2007): 71–131.

Brown, A. Peter. *The Second Golden Age of the Viennese Symphony: Brahms, Bruckner, Dvořák, Mahler, and Selected Contemporaries*. Bloomington: Indiana University Press, 2003.

Browne, Richmond. "Tonal Implications of the Diatonic Set." *In Theory Only* 5, nos. 6–7 (Summer 1981): 3–21.

Burghauser, Jarmil. "Metamorphoses of Dvořák's Image in the Course of Time." In *Rethinking Dvořák*, edited by David Beveridge, 13–30. New York: Clarendon Press, 1996.

———. "Smetana's Influence on Dvořák's Creative Evolution." In *Bedřich Smetana, 1824–1884: report of the International Musicological Conference, Praha 24th–26th May 1994*, 43–53. Prague: Muzeum Bedřicha Smetany, 1995.

Burkholder, J. Peter. *All Made of Tunes: Charles Ives and the uses of Musical Borrowing*. New Haven, CT: Yale University Press, 1995.

Cadwallader, Allen and David Gagné. *Analysis of Tonal Music: A Schenkerian Approach*. New York: Oxford University Press, 1998.

Cadwallader, Allen. "More on Scale Degree Three and the Cadential Six-Four." *Journal of Music Theory* 36, no. 1 (Spring 1992): 187–198.

Caplin, William E. *Classical Form: a Theory of Formal Functions for the Instrumental Music of Haydn, Mozart, and Beethoven*. New York: Oxford University Press, 1998.

Carpenter, Patricia. "Schoenberg's Tonal Body." *Theory and Practice* 30 (2005): 35–68.

Carter, Paul S. *Retrogressive Harmonic Motion as Structural and Stylistic Characteristic of Pop-Rock Music*. Ph.D. diss., University of Cincinnati, 2005.

Childs, Adrian. "Moving Beyond Neo-Riemannian Triads: Exploring a Transformational Model for Seventh Chords." *Journal of Music Theory* 42, no. 2 (Autumn 1998): 181–93.

Cinnamon, Howard. "Classical Models, Sonata Theory, and the First Movement of Liszt's *Faust* Symohony." *Gamut* 4, vol. 1 (2011): 53–91.

———. "Tonic Arpeggiation and Successive Equal Third Relations as Elements of Tonal Evolution in the Music of Franz Liszt." *Music Theory Spectrum* 8 (Spring 1986): 1–24.

Clapham, John. *Antonín Dvořák, Musician and Craftsman*. New York: St. Martin's Press, 1966.

———. *Dvořák*. London: David and Charles, 1979.

———. "Dvořák's Relations with Brahms and Hanslick." *The Musical Quarterly* 57, no. 2 (Spring 1971): 241–54.

———. "Dvořák's Symphony in D Minor: The Creative Process." *Music & Letters* 42, no. 2 (Spring 1961): 103–116.

———. "The Evolution of Dvořák's Symphony 'From the New World.'" *The Musical Quarterly* 44, no. 2 (Spring 1958): 167–183.

———. "The National Origins of Dvořák's Art." *Proceedings of the Royal Music Association*, 89th Session (1962–63): 75–88.

Cohn, Richard. "As Wonderful as Star Clusters: Instruments for Gazing at Tonality in Schubert." *19th-Century Music* 22, no. 3 (1999): 213–32.

———. "The Autonomy of Motives in Schenkerian Accounts of Tonal Music." *Music Theory Spectrum* 14, no. 2 (Autumn 1992): 150–170.

———. "Maximally Smooth Cycles, Hexatonic Systems, and the Analysis of Late-Romantic Triadic Progressions." *Music Analysis* 15, no. 1 (Spring 1996): 9–40.

———. "Neo-Riemannian Operations, Parsimonious Trichords, and Their 'Tonnetz' Representations." *Journal of Music Theory* 41, no. 1 (Spring 1997): 1–66.

———. "Square Dances with Cubes." *Journal of Music Theory* 42, no. 2 (Autumn 1998): 283–296

———. "Uncanny Resemblances: Tonal Signification in the Freudian Age." *Journal of the American Musicological Society* 57, no. 2 (Summer 2004): 285–323.

Cone, Edward T. *The Composer's Voice*. Berkeley: University of California Press, 1974.

———. "Schubert's Promissory Note." *19th-Century Music* 5, no. 3 (Spring 1982): 233–241.

Dahlhaus, Carl. *Between Romanticism and Modernism: Four Studies in the Music of the Later Nineteenth Century*. Translated by Mary Whittall. Berkeley: University of California Press, 1980.

———. *Nineteenth Century Music*. Translated by J. Bradford Robinson. Berkeley: University of California Press, 1989.

Damschroder, David. *Thinking about Harmony: Historical Perspectives on Analysis*. New York: Cambridge University Press, 2008.

Darcy, Warren. "Rotational Form, Teleological Genesis, and Fantasy-Projection in the Slow Movement of Mahler's Sixth Symphony." *19th-Century Music* 25, no. 1 (Summer 2001): 49–74.

———. "Bruckner's Sonata Deformations." In *Bruckner Studies*, edited by Timothy Jackson and Paul Hawkshaw, 256–77. New York: Cambridge University Press, 1997.

Day-O'Connell, Jeremy. "The Rise of $\hat{6}$ in Nineteenth Century Music." *Music Theory Spectrum* 24, no. 1 (Spring 2002): 35–67.

Daverio, John. "From 'Concertante Rondo' to 'Lyric Sonata': A Commentary on Brahms's Reception of Mozart." In *Brahms Studies* 1, edited by David Brodbeck, 111–136. Lincoln, NE: University of Nebraska Press, 1995.

Döge, Klaus. *Antonín Dvořák. Leben-Werke-Dokumente*. Mainz: Schott, 1991.

———. "Dvořák, Antonín (Leopold)." *New Grove Dictionary of Music and Musicians*, 2nd ed., vol. 7. Edited by Stanley Sadie and John Tyrrell, 777–814. New York: MacMillan, 2001.

Döge, Klaus and Karin Stöckl**.** *Antonín Dvořák, Sinfonie Nr.9 e-moll, op.95 'Aus der Neuen Welt': Einführung und Analyse*. Mainz: Schott, 1982.

Douthett, Jack and Peter Steinbach. "Parsimonious Graphs: A Study in Parsimony, Contextual Transformations, and Modes of Limited Transposition." *Journal of Music Theory* 42, no. 2 (Autumn 1998): 241–263.

Dvořák, Antonín, in collaboration with Henry T. Finck. "Franz Schubert." *Century Illustrated Monthly Magazine* 48, no. 3 (1894): 341–46.

Federhofer, Hellmut. *Heinrich Schenker: Nach Tagebüchern und Briefen in der Oswald Jonas Memorial Collection*. Hildesheim: Georg Olms Verlag, 1985.

Fertitta, Robert. *The Harmonic Vocabulary of Antonín Dvořák*. Masters thesis, Queens College, New York City, 1976.

Fischl, Viktor, ed. *Antonín Dvořák: His Achievement*. London: Drummond, 1943. Reprint, Westport, CT: Greenwood Press, 1970.

Frisch, Walter. *Brahms and the Principle of Developing Vriation*. Berkeley: University of California Press, 1984.

Gabrielová, Jarmilla. "Antonín Dvořák und Johannes Brahms: Bemerkungen zur Kompositionsproblematik der Symphonie Nr.6 D-Dur, op.60." *Die Instrumentalmusik: Struktur–Funktion–Ästhetik* (1994): 157–64.

———. "Antonín Dvořák and Richard Wagner." *Muzikologija* 6 (2006): 305–316.

Gauldin, Robert. "The Theory and Practice of Chromatic Wedge Progressions in Romantic Music." *Music Theory Spectrum* 26, no. 1 (Spring 2004): 1–22.

Gjerdingen, Robert. "The Formation and Deformation of Classic/Romantic Phrase Schemata." *Music Theory Spectrum* 8 (Spring 1986): 25–43.

Goehr, Lydia. *The Imaginary Museum of Musical Works: An Essay in the Philosophy of Music*. New York: Oxford University Press, 2007.

Goldenberg, Yosef. "'Negative Texture' and the Prolongation of Seventh Chords." *Theory and Practice* 29 (2004): 95–123.

Gollin, Edward. "Some Aspects of Three-Dimensional *Tonnetze*." *Journal of Music Theory* 42, no. 2 (Autumn 1998):195–206.

Harrison, Daniel. *Harmonic Function in Chromatic Music: a Renewed Dualist Theory and an Account of its Precedents*. Chicago: University of Chicago Press, 1994.

———. "Nonconformist Notions of Nineteenth-Century Enharmonicism," *Music Analysis* 21, no. 2 (2002): 115–160.

———. "Supplement to the Theory of Augmented-Sixth Chords." *Music Theory Spectrum* 17, no. 2 (Autumn 1995): 170–195.

Haselböck, Lukas. "Dvořáks 6. Sinfonie: Ein 'intertextueller' Kommentar zu Brahms' 2. Sinfonie?" *Hudební věda* 41, nos. 3–4 (2004): 341–354.

Hatten, Robert. *Musical Meaning in Beethoven*. Bloomington: Indiana University Press, 1994.

Hermerén, Göran. *Influence in Art and Literature*. Princeton: Princeton University Press, 1975.

Hepokoski, James. "Back and Forth from 'Egmont': Beethoven, Mozart, and the Nonresolving Recapitulation." *19th-Century Music* 25, no. 2–3, "The Long Century, 1780–1920" (Autumn 2001–Spring 2002): 127–154.

———. "Beyond the Sonata Principle." *Journal of the American Musicological Association* 55, no. 1 (Spring 2002): 91–154.

———. "Culture Clash: James Hepokoski Revisits Dvořák's *New World Symphony*." *The Musical Times* 134, no. 1810 (Winter 1993): 685–688.

———. "Fiery-Pulsed Libertine or Domestic Hero?: Strauss's *Don Juan* Reinvestigated." In *Richard Strauss: New Perspectives on the Composer and His Work*, edited by Bryan Gilliam, 135–175. Durham and London: Duke University Press, 1992.

———. "Rotations, Sketches, and the Sixth Symphony [of Sibelius]." In *Sibelius Studies*, edited by Timothy Jackson and Veijo Murtomäki, 322–51. New York: Cambridge University Press, 2001.

Hepokoski, James and Warren Darcy. *Elements of Sonata Theory*. New York: Oxford University Press, 2006.

———. "The Medial Caesura and its Role in the Eighteenth-Century Sonata Exposition." *Music Theory Spectrum* 19 (1997): 115–54.

Horowitz, Joseph. *Classical Music in America*. New York: W. W. Norton, 2005.

Hurwitz, David. *Dvořák: Romantic Music's Most Versatile Genius*. Pompton Plains, NJ: Amadeus Press, 2005.

Hyer, Brian. "Reimag(in)ing Riemann." *Journal of Music Theory* 39, no. 1 (Spring 1995): 101–138.

Ivanov, Miroslav. *In Dvořák's Footsteps: Musical Journeys in the New World*. Translated by Stania Slabor. Kirksville, MO: Thomas Jefferson University Press, 1995.

Jackson, Timothy. *Tchaikovsky: Symphony no. 6 (Pathétique)*. Cambridge: Cambridge University Press, 1999.

———. "The Tragic Reversed Recapitulation in the German Classical Tradition." *Journal of Music Theory* 40, no. 1 (Spring 1996): 61–111.

Jers, Norbert. "'Dvořák, der Progressive:'entwickelnde Variation in der 9. Symphonie." *Musica* 33, no. 3 (1979): 258–62.

Keiler, Allan. "The Empiricist Illusion: Narmour's *Beyond Schenkerism*." *Perspectives of New Music* 17, no. 1 (Winter 1978): 161–95.

Kerman, Joseph. "Notes on Beethoven's Codas." In *Beethoven Studies 3*, edited by Alan Tyson, 141–160. New York: Cambridge University Press, 1982.

Kinderman, William and Harald Krebs, eds. *The Second Practice of Nineteenth-Century Tonality*. Lincoln: University of Nebraska Press, 1996.

Kinton, Leslie. *A Documentary Study and Schenkerian Analysis of Dvořák's Symphony in D Minor, op. 70*. Ph.D. diss., University of Toronto, 2008.

Klein, Michael. *Intertextuality in Western Art Music*. Bloomington, IN: Indiana University Press, 2005.

Koch, Heinrich Christoph. *Versuch einer Anleitung zur Composition* [Introductory essay on composition]. Translated by Nancy K. Baker. New Haven: Yale University Press, 1983.

Kopp, David. *Chromatic Transformations in Nineteenth-century Music*. New York: Cambridge University Press, 2002.

———. "On the Function of Function." *Music Theory Online* 1, no. 3 (May 1995). http://www.mtosmt.org/issues/mto.95.1.3/mto.95.1.3.kopp.art

Kramer, Lawrence. *Music as Cultural Practice, 1800–1900*. Berkeley: University of California Press, 1993.

Kraus, Joseph. "Mozart's Chromatic Third Relations: Evidence from the Late Quartets and Quintets." *Journal of Musicological Research* 9, no. 4 (Spring 1990): 229–254.

Kuhn, Judith. *Shostakovich in Dialogue: Form, Imagery and Ideas in String Quartets 1–7*. Farnham, Great Britain: Ashgate, 2010.

Larson, Steve. "The Problem of Prolongation in Tonal Music: Terminology, Perception, and Expressive Meaning." *Journal of Music Theory* 41, no. 1 (Spring 1997): 101–136.

Layton, Robert. *Dvořák Symphonies and Concertos*. Seattle: University of Washington Press, 1978.

Lewin, David. "Amfortas's Prayer to Titurel and the Role of D in "Parsifal": The Tonal Spaces of the Drama and the Enharmonic C♭/B." *19th-Century Music* 7, no. 3 (Spring 1984): 336– 49.

———. *Generalized Musical Intervals and Transformations*. New Haven, CT: Yale University Press, 1987.

———. "Transformational Techniques in Atonal and Other Music Theories." *Perspectives of New Music* 21, nos. 1–2 (Summer 1983): 312–71.

Longyear, Rey M. and Kate R. Covington. "Motivic Unity and Harmonic Variety in Dvořák's *Requiem*." *In Theory Only* 12, nos. 5–6 (Autumn 1992): 51–64.

Marx, Adolf Bernhard. *Musical Form in the Age of Beethoven: Selected Writings on Theory and Method*. Edited and translated by Scott Burnham. Cambridge: Cambridge University Press, 1997.

McKee, Eric. "Auxiliary Progressions as a Source of Conflict between Tonal Structure and Phrase Structure." *Music Theory Spectrum* 18, no. 1 (Spring 1996): 51–76.

Meeus, Nicolas. "Toward a Post-Schoenbergian Grammar of Tonal and Pre-tonal Harmonic Progressions." *Music Theory Online* 6, no. 1 (January 2000). http://www.mtosmt.org/issues/mto.00.6.1/mto.00.6.1.meeus.html

Meyer, Leonard. *Style and Music: Theory, History, and Ideology*. Chicago: University of Chicago Press, 1996.

Monelle, Raymond. *The Sense of Music*. Princeton: Princeton University Press, 2000.

Moreno, Jairo. "Subjectivity, Interpretation, and Irony in Gottfried Weber's Analysis of Mozart's 'Dissonance' Quartet." *Music Theory Spectrum* 25, no. 1 (Spring 2003): 99–120.

Moseley, Roger. "Reforming Johannes: Brahms, Kreisler Junior and the Piano Trio in B, Op. 8." *Journal of the Royal Musical Association* 132, no. 2 (2007): 252–305.

Narmour, Eugene. *The Analysis and Cognition of Basic Melodic Structures: The Implication-Realization Model*. Chicago: University of Chicago Press, 1990.

———. *Beyond Schenkerism*: *The Need for Alternatives in Music Analysis*. Chicago: University of Chicago Press, 1977.

Newbould, Brian. *Schubert: The Music and the Man*. Berkeley: University of California Press, 1999.

Oster, Ernst. "Register and the Large-Scale Connection." *Journal of Music Theory* 5, no. 1 (Spring 1961): 54–71.

Ottlová, Marta and John Tyrrell. "Smetana." *New Grove Dictionary of Music and Musicians,* 2nd ed., vol. 23. Edited by Stanley Sadie and John Tyrrell, 537–58. New York: MacMillan, 2001.

Pascall, Robert. "Some Special Uses of Sonata Form by Brahms." *Soundings* 4 (1974): 58–63.

Petersen, Peter. "Brahms und Dvořák." In *Brahms und seine Zeit*, edited by Constantin Floros, Hans Joachim Marx and Peter Petersen, 125–146. Laaber, Germany: Laaber-Verlag, 1984.

Platoff, John. "Writing About Influences: *Idomeneo*, a Case Study." In *Explorations in Music, the Arts, and Ideas: Essays in Honor of Leonard B. Meyer*, edited by Ruth Solie and Eugene Narmour, 43–65. Hillsale, NY: Pendragon Press, 1989.

Proctor, Gregory. *Technical Bases of Nineteenth-century Chromatic Tonality: a Study in Chromaticism*. Ph.D. diss., Princeton University, 1978.

Ratner, Leonard. *Classic Music: Expression, Form, and Style*. New York: Schirmer Books, 1980.

———. *Harmony: Structure and Style*. New York: McGraw-Hill, 1962.

———. *Romantic Music: Sound and Syntax*. New York: Schirmer Books, 1992.

Réti, Rudolph. *The Thematic Process in Music*. Westport, CT: Greenwood, 1978.

Robertson, Alec. *Dvořák*. London: J. M. Dent and Sons, 1945. Reprint, 1964.

Rosen, Charles. *The Classical Style*, expanded edition. New York: Norton, 1997.

———. *The Romantic* Generation. Cambridge, MA: Harvard University Press, 1995.

———. *Sonata Forms*, rev. ed. New York: Norton, 1988.

Rothgeb, John. "Design as a Key to Structure in Tonal Music." *Journal of Music Theory* 15, nos. 1–2 (Spring–Winter, 1971): 230–253.

———. Review of *Beyond Schenkerism*, by Eugene Narmour. *Theory and Practice* 3, no. 2 (Autumn 1978): 28–42.

Rothstein, William. "On Implied Tones." *Music Analysis* 10, no. 3 (1991): 289–328.

———. *Phrase Rhythm in Tonal Music*. New York: Schirmer Books, 1989.

Salzer, Felix. *Structural Hearing*: *Tonal Coherence in Music*. New York: Dover Publications, 1962.

Samarotto, Frank. "'Plays of Opposing Motion': Contra-structural Melodic Impulses in Voice-leading Analysis." *Music Theory Online* 15, no. 2 (June 2009). http://www.mtosmt.org/issues/mto.09.15.2/mto.09.15.2.samarotto.html

Saslaw, Janna. "Gottfried Weber and Multiple Meaning." *Theoria*: *Historical Aspects of Music Theory* 5 (1990): 74–103.

———. "Forces, Containers, and Paths: The Role of Body-Derived Image Schemas in the Conceptualization of Music." *Journal of Music Theory* 40, no. 2 (1996): 217–44.

———. "Life forces: Conceptual Structures in Schenker's *Free Composition* and Schoenberg's *The Musical Idea*." *Theory and Practice* 22–23 (1997): 17–33.

Schachter, Carl. "The First Movement of Brahms's Second Symphony: The Opening Theme and Its Consequences." *Music Analysis* 2, no. 1 (1983): 55–68.

———. "Structure as Foreground: 'das Drama des Ursatzes.'" In *Schenker Studies* 2, edited by Carl Schachter and Hedi Siegel, 298–314. New York: Cambridge University Press, 1999.

———. *Unfoldings*: *Essays in Schenkerian Theory and Analysis*. New York, NY: Oxford University Press, 1999.

Schenker, Heinrich. "The Decline of the Art of Composition: A Technical-Critical Study." Translated by William Drabkin. *Music Analysis* 24, no. 1–2 (2005): 33–129.

———. *Free Composition (Der freie Satz)*, translated and edited by Ernst Oster, 2 vol. New York: Longman, 1979. Reprint, Hillsale, NY: Pendragon Press.

———. *Harmony*. Edited by Oswald Jonas, translated by Elisabeth Mann Borgese. Chicago: University of Chicago Press, 1954.

Schick, Hartmut. *Studien zu Dvořáks Streichquartetten*. Laaber: Laaber-Verlag, 1990.

Schoenberg, Arnold. *Style and Idea: Selected Writings of Arnold Schoenberg*. Edited by Leonard Stein with translations by Leo Black. Berkeley: University of California Press, 1984.

Schumann, Robert. "A Symphony by Hector Berlioz." In *Berlioz: Fantastic Symphony,* edited by Edward T. Cone, 220–48. New York: Norton, 1971.

Shamgar, Beth. "Schubert's Classic Legacy: Some Thoughts on Exposition-Recap. Form." *The Journal of Musicology* 18, no. 1, A Musicological Bouquet: Essays on Style, Sources, and Performance in Honor of Bathia Churgin (Winter 2001): 150–169.

Smaczny, Jan. "'Alfred': Dvořák's First Operatic Endeavour Surveyed." *Journal of the Royal Music Association* 115, no. 1 (1990): 80–106.

———. *Dvořák: Cello Concerto*. New York: Cambridge University Press, 1999.

———. "The Schubertian Inheritance among Czech Composers in the Mid-Nineteenth Century." *Schubert durch die Brille: Internationales Franz Schubert Institut—Mitteilungen* 21 (Summer 1998): 61–75.

Smith, Charles. "The Functional Extravagance of Chromatic Chords." *Music Theory Spectrum* 8 (Spring 1986): 94–139.

Smith, Peter H. "Brahms and Motivic 6/3 Chords." *Music Analysis* 16, no. 2 (Summer 1997): 175–217.

———. "Brahms and Schenker: A Mutual Response to Sonata Form." *Music Theory Spectrum* 16, no. 1 (Spring 1994): 77–103.

———. "Brahms and the Neapolitan Complex: ♭II, ♭VI, and Their Multiple Functions in the First Movement of the F-minor Clarinet Sonata." In *Brahms Studies* 2, edited by David Brodbeck, 169–208. Lincoln, NB: University of Nebraska Press, 1998.

———. *Expressive Forms in Brahms's Instrumental Music: Structure and Meaning in His Werther Quartet*. Bloomington, IN: Indiana University Press, 2005.

———. "Harmonic Cross-Reference and the Dialectic of Articulation and Continuity in Sonata Expositions of Schubert and Brahms." *Journal of Music Theory* 50, no. 2 (Fall 2006): 143–179.

———. "New Perspectives on Brahms's Linkage Technique." *Intégral* 21 (2007): 109–154.

Snarrenberg, Robert. "The Art of Translating Schenker: A Commentary on *The Masterwork in Music*, vol. 1." *Music Analysis* 2–3 (Autumn 1996): 301–342.

Sobaski, James. "Associative Harmony: The Reciprocity of Ideas in Musical Space." *In Theory Only* 10, no. 1-2 (Summer 1987): 31–64.

Somer, Avo. "Chromatic Third-Relations and Tonal Structure in the Songs of Debussy." *Music Theory Spectrum* 17, no. 2 (Autumn 1995): 215–241.

Solie, Ruth A. "The Living Work: Organicism and Musical Analysis." *19th-Century Music* 4, no. 2 (Autumn 1980): 147–156.

Šourek, Otakar. *Antonín Dvořák Letters and Reminiscences*. Translated by Roberta Samsour. Prague: Artis, 1954.

———. *The Orchestral Works of Antonín Dvořák*. Translated by Roberta Samsour. Westport, CT: Greenwood Press, 1970.

Stefan, Paul. *Dvořák*. Translated by Y. W. Vance. New York: Greystone Press, 1941. Reprint, New York: Da Capo Press, 1971.

Stein, Deborah. "The Expansion of the Subdominant in the Late Nineteenth Century." *Journal of Music Theory* 27, no. 2 (Autumn 1983): 153–180.

Straus, Joseph. "The Problem of Prolongation in Post-Tonal Music." *Journal of Music Theory* 31, no. 1 (Spring 1987): 1–21.

———. "Response to Larson." *Journal of Music Theory* 41, no. 1 (Spring 1997): 137–139.

Swinden, Kevin J. "When Functions Collide: Aspects of Plural Function in Chromatic Music." *Music Theory Spectrum* 27, no. 2 (Autumn 2005): 249–282.

Taylor, Benedict. "Modal Four-Note Pitch Collections in the Music of Dvořák's American Period." *Music Theory Spectrum* 32, no. 1 (Spring 2010): 44–59.

Tchaikovksy, Peter Ilyich. *Guide to the Practical Study of Harmony*. Translated by Emil Krall and Jame Liebling from the German version of P. Juon. Canoga Park, CA: Summit Publishing Company, l970.

Telesco, Paula J. "Enharmonicism and the Omnibus Progression in Classical-Era Music." *Music Theory Spectrum* 20, no. 2 (Autumn 1998): 242–279.

———. "Forward-Looking Retrospection: Enharmonicism in the Classical Era." *The Journal of Musicology* 19, no. 2 (Spring 2002): 332–373.

Tovey, Donald Francis. *Essays in Musical Analysis*. *Symphonies and other Orchestral Works.* New York: Oxford University Press, 1981

———. *The Main Stream of Music and Other Essays*. New York: Oxford University Press, 1949. Reprint, New York: Meridian Books, 1959.

Tusa, Michael. "Beethoven's 'C-minor Mood': Some Thoughts on Structural Implications of Key Choice." In *Beethoven Forum* 2, edited by Lewis Lockwood, Christopher Reynolds, and James Webster, 1–27. Lincoln, NE: University of Nebraska Press, 1993.

Dmitri Tymoczko. *A Geometry of Music*. New York: Oxford University Press, 2011.

Vojtech, Kyas. "Smetana e Dvořák e il loro rapporto con Schubert." *Nuova rivista musicale italiana* 18, no. 1 (Spring 1984): 52–62.

Wallace, Robin. *Beethoven's Critics.* Cambridge, MA: Cambridge University Press, 1986.

Wason, Robert W. *Viennese Harmonic Theory: From Albrechtsberger to Schenker and Schoenberg.* Ann Arbor, Mich.: UMI Research Press, 1984.

Webster, James. *Haydn's "Farewell Symphony and the Idea of Classical Style: Through-Composition and Cyclic Integration in His Instrumental Music*. Cambridge: Cambridge University Press, 1991.

———. "Schubert's Sonata Form and Brahms's First Maturity." *19th-Century Music* 2, no. 1 (Summer 1978): 18–35, and *19th-Century Music* 3, no. 1 (Summer 1979): 52–71.

———. "Sonata Form." *New Grove Dictionary of Music and Musicians,* 2nd ed., vol. 23. Edited by Stanley Sadie and John Tyrrell, 687–701. New York: MacMillan, 2001.

Wen, Eric. "Bass-line Articulations of the *Urlinie*." In *Schenker Studies* 2, edited by Carl Schachter and Hedi Siegel, 276–297. New York: Cambridge University Press, 1999.

White, Harry. "Art Music and the Question of Ethnicity: The Slavic Dimension of Czech Music from an Irish Point of View." *International Review of the Aesthetics and Sociology of Music* 35, no. 1 (Summer 2004): 29–46.

Wintle, Christopher. "The 'Sceptered Pall': Brahms's Progressive Harmony." In *Brahms* 2, edited by Michael Musgrave, 197–222. Cambridge: Cambridge University Press, 1987.

Wollenberg, Susan. "Celebrating Dvořák: Affinities between Schubert and Dvořák." *The Musical Times* 132, no. 1783 (Autumn 1991): 434–437.

Woodside, Mary S. "Leitmotiv in Russia: Glinka's Use of the Whole-Tone Scale." *19th-Century Music* 14, no. 1 (Summer 1990): 67–74.

Yellin, Victor. *The Omnibus Idea*. Detroit: Harmonic Park Press, 1998.

Zemanova, Mirka. *Janáček: A Composer's Life*. Boston: Northeastern University Press, 2002.