## Analytical Approaches to Chromaticism in Amy Beach's Piano Quintet in F# Minor

## ROSE MARIE CHISHOLM FLATT

Few detailed analyses are available of the many second-rank works from the late nineteenth century which are now being revived. These works constitute an important summary of stylistic practice, the investigation of which would serve to clarify stylistic procedures of the period and improve methodologies for analyzing highly chromatic music.

In the nineteenth century, chromaticism was regarded as the addition of pitches from the semitonal scale to the diatonic scale, since limited use of chromaticism does not threaten traditional tonic-dominant tonality. Assuming that Amy Beach's Piano Quintet in  $F^{\frac{1}{7}}$  Minor, Opus 67, has as its underlying frame of reference a diatonic major-minor tonal model, this article will attempt to analyze the effects of chromatic additions to this framework.

Explaining the function of chromaticism in a passage of late nineteenth-century music can present many difficulties. Chromatic tones can serve either a harmonic function (as in tonicization by secondary dominant) or a linear function (embellishing the diatonic scale). Outer-voice motion assumes primary importance in some passages; inner voices are chosen to create interesting sonorities and to maintain smooth voice leading rather than to comply with customary functional root movement.

Often the function of chromatic tones is least clear when they appear in combination with extended tertian chords. When a passage also includes rapid changes of tonal center, delayed resolutions and ambiguous harmonic rhythm, chromatic tones make the determination of exact points of chord change problematic. It is also difficult to assign hierarchical significance to these chords once identified. The overall linear motion of voices may seem fairly obvious but systematic description is often elusive.

Chromaticism can play one of the following roles in late nineteenth century music:

- Alteration of a diatonic melodic and harmonic framework.
- Lending emphasis either to linear or to harmonic function.
- Expansion of the central tonality with secondary regions.
- 4. Tonal ambiguity.
- 5. Delineation of formal sections.

Many feel that available analytical techniques are inadequate when applied to highly chromatic music and have attempted to provide new methods. However, it may be that no
single method can ever provide sufficient perspective to
relate linear and vertical elements of late Romantic music
in a meaningful way. Theorists often intuitively supply
data from several approaches without exploring them
systematically. Most theorists would agree that all possible tools should be used; in practice, however, many concentrate on a single method. Here, existing techniques will
be combined and the data correlated in order to draw some
general conclusions. The techniques to be used are:

- Traditional techniques for diagramming formal structure.
- 2. Metric reduction to a chordal framework.
- Non-metric identification of vertical structures, deleting non-harmonic tones on various levels and adding Roman numeral analysis at these levels.
- 4. Abstraction of tonal regions and tonal fluctuation (adapted from the methodology and graphing techniques of Wallace Berry).
- 5. Reductive graphing in a style based on Schenkerian techniques, with emphasis on outer lines whose motion may influence harmonic progressions.
- Charting of thematic fragments and their modifications as a basis for comparison with linear graphs and chordal abstractions.

When these techniques yield conflicting interpretations, aural evidence is helpful in correlating and synthesizing the data.

A passage from Amy Beach's Piano Quintet in F# Minor has

been chosen to illustrate the use of this methodology. Amy Marcy Cheney Beach (1867-1944) was a gifted pianist and a prolific composer. An intellectual as well as an artistic prodigy, she was multilingual and was also interested in such diverse subjects as mathematics, philosophy, and ornithology. By the time she was three, she was improvising at the piano; at four she began to compose little pieces, and by sixteen she was a concert pianist.

Her training as a composer was not traditional. She studied harmony for one year with Junius Hill but had to train herself in composition. Since she had a good knowledge of languages, she translated many treatises on composition and orchestration and studied the masterworks of the past. She gave an example of her self-imposed study in a 1943 article: "I learned the fugue form by writing out much of the Well-Tempered Clavier, from memory, voice for voice. The points where my voices crossed differently from Bach's indicated valuable lessons!" She followed the same procedure with orchestration after listening to symphony concerts.

Her husband, Henry Harris Aubrey Beach, himself an amateur musician, encouraged her compositional efforts but refused to allow her to study formally, thinking that this might destroy her originality. Unfortunately, this limitation also prevented her from being exposed to new ideas of the time; she continued to write in a late Romantic style long after most other composers had abandoned it. Nevertheless, during her married life she produced a large corpus of works, most of which were published and performed, often with the composer at the piano.

Chromaticism is profuse in all Beach's works; moreover, elaborate piano figuration is typical of all but the later pieces. Beach is usually termed an eclectic, backward-looking composer. Although at the time of her death her music was considered passe, she began composing at a time when Wagner and Brahms were still not accepted; reviewers of the time considered her songs very modern.

Some touches of Impressionism are found in later works, but other contemporary currents are largely absent. The influence of Chopin and Liszt is clear in her piano figuration, and hints of Scriabin appear in Five Improvisations for Piano, Opus 148. Her German structural style stems from her admiration of Brahms.

The piano quintet, written in the middle of Beach's compositional career, is an elaborate, chromatic work with expansive melodies and virtuosic writing for the piano. It

<sup>&</sup>lt;sup>1</sup>Benjamin Brooks, "The 'How' of Creative Composition," Etude 61 (March 1943):208.

was first performed by the Hoffman Quartet with the composer at the piano in Boston on February 20, 1908, and received many performances during the next decade. A recent recording is available.

This discussion examines in detail mm. 1-34 of the second movement. The passage consists of four statements of a melody with its underlying harmonic support. Example 1 shows how this passage fits into the second movement. Analytical problems to be examined are:

- Determination of significant vertical (chordal) structures and a comparison of these structures as they appear in the four statements.
- 2. Determining changes of tonal center.
- Explanation of the relationship between tonal regions and harmonic motion from one region to another.
- Determining where linear motion rather than traditional root movement is the major impetus for chord changes.
- 5. Relationship of motivic changes to harmonic ones.

METRIC REDUCTIONS. A harmonic reduction which determines chordal motion and essential voice leading in relatively equal units can be a useful first step in eliminating less essential chromatic tones. In very chromatic passages deletions are more problematic and may be altered by data from other approaches.

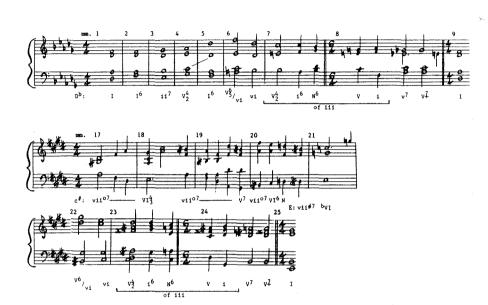
The basic thematic material (mm. 1-8) responds easily to harmonic reduction since the texture is largely chordal. However, mm. 17-25 are much more problematic, and decisions seem more arbitrary. One version of the harmonic reductions of each of these statements is given in Example 2.

The chromatic outer voices in m. 20 make harmonic reduction especially difficult. There is no clear harmonic chordal motion within the measure to which pitches can be related; instead, the motion of the lines predominates, with B# (lower voice) and F# (upper voice) clearly moving to E and C in m. 21. The problem is to describe more specifically the influence of this motion on the harmonic structure. Since the results of this reduction do not illuminate this influence, the problem can be resolved only by the application of additional techniques dealing specifically with linear influence.

 $<sup>^2</sup>$ Since the score of this work may not be available to many of our readers, mm. 1-34 of the second movement are reproduced at the end of the article.

FIRST THEME	SECOND THEME	DEVELOPMENT
m. 1 First theme, strings Db major  m. 9 First theme, piano, Db major, cadence to Ab (V)  m. 17 First theme, inverted (in bass) cb minor moving to E major  m. 25 First theme, E major, with extended ending, modulating to bb minor	m. 35 Second theme, strings b <sup>b</sup> minor; imitation  m. 47 Second theme, modified harmonic support, ending in b <sup>b</sup> minor  m. 54 Second theme, fragmented Sequences, ending in b <sup>b</sup> minor	m. 63  First theme, modified, in bass; second theme fragments, ending in bb minor  m. 76  First theme, modified, over Gb pedal, bass moving chromatically  m. 89  Second theme, becoming first theme at end; bass moves chromatically to Db major
m. 95 First theme, cell m. 103 Deceptive cadence theme, modified a sequences; final theme extended, e V7 of Db major	themes fragmented modified; ends wi to first Db major triad nd developed; measure of	l and Lth
Tonicizations:		
mm. 1 17 25 35 47	54 63 76	89 95 103 114

Example 2. Metric Reduction, mm. 1-9 and 17-25.



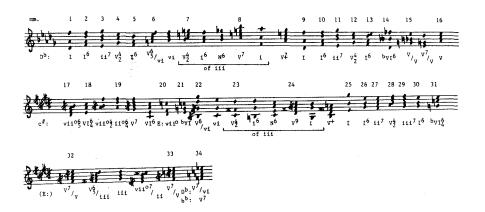
NON-METRIC REDUCTIONS. It is possible to restore some notes deleted in the previous reductions in order to examine the vertical structures formed by each pitch change. A comparison of the previous reduction of mm. 17-18 to a more detailed vertical approach may provide a basis for an ordering of the chords later on. Example 3 shows these two approaches.

Example 3. Comparison, mm. 17-18.



Inclusion of all vertical structures formed in a longer passage is of little value unless there is some assignation of hierarchy and deletion of repetitions; a structural picture of the harmonic progression of the passage then emerges more clearly. A comparison of the four thematic statements in mm. 1-34 treated in this way shows where the original progression (mm. 1-8) has been either paralleled or expanded in succussive presentations. Example 4 contains the results of the application of this technique.

Example 4. Non-metric Reductions, mm. 1-34.



Variations from the original framework can be charted in this approach, as seen clearly in the Roman numeral abstraction given in Example 5. For example, the move to vi is expanded and developed in the third statement by successive deceptive resolutions from vii<sup>0</sup>7, thereby contributing to the harmonic instability of this presentation. Instability is also created by inverting the beginning motive, thus forming a melodic diminished triad.

Certain junctures in the original progression are fairly stable, as, for instance,  $I-I^6$  and  $V^{\frac{1}{2}}-I^6_3$ . The  ${}^bVI$  of the second statement ( $B^b-D^b-F^b$ ) reappears as  $A-C^{\frac{1}{7}}-E$  in the third statement, functioning as  $VI^6$ ,  $VI^6$  (in  $C^{\frac{1}{7}}$  minor) and  $N^6$  of iii.

Non-metric reductions can also be used to determine how the statements can be grouped into larger formal units; for example, the instability of the third statement would imply that it is a transitional section.

It is important to determine tonal hierarchy in chromatic

Example 5. Roman Numeral Abstraction, mm. 1-34.

Statemer	nt							
1.	Dp: 1	1 6	   11 <sup>7</sup> 	v <sub>2</sub> 4	   1 <sup>6</sup> 	  V <sup>6</sup> 5/v1 v1   	v <sub>2</sub> 16 N <sup>6</sup> v <sup>7</sup> 1	! ! v <sup>7+</sup>
2.	pb: 1	1 <sup>6</sup>	   11 <sup>7</sup> 	$v_2^4$	   1 <sup>6</sup> 	  b <sub>VI</sub> 6	v/v v <sup>7</sup> /v	I ! v I
3,	c#: vii <sup>06</sup> 5	VI <sub>4</sub>	   vii <sup>04</sup> ii <sup>06</sup> y7 	VI6	  E:vii <sup>o b</sup> VI 	     <sup> V6</sup> /v1 v1   	v <sub>2</sub> 16 N6 v <sup>7</sup> 1	! ! v <sup>+</sup> !
4.	E: I	1 1 <sup>6</sup>	1 117 1 1	v <sub>2</sub> 111 <sup>7</sup>	   1 <sup>6</sup> 		v <sup>7</sup> /v v <sup>6</sup> /111 111  [v11 <sup>07</sup> /11]	,   D <sup>b</sup> :V <sup>7</sup> /vi   b <sup>b</sup> :V <sup>7</sup>

works, since tonal relationships in nineteenth-century practice are not as obvious as in the seventeenth and eighteenth centuries. Further conclusions about mm. 1-34 can be reached by grouping the harmonies around tonal centers at a local level and charting them using Wallace Berry's methods, in which tonal materials are abstracted from a specific work and ranked according to relative significance. The most significant region is that which extends its influence over the broadest level of structure. (1) cadential Criteria for determining tonal regions are: function (strength and formal position of the cadence, number of cadences in the region) and (2) durations of occurrence. Every tonicization (usually marked by a dominant chord or a leading tone) has potential tonal significance. To establish a hierarchy of regions, the relative strength and number of cadences and the relative durations of occurrence are considered.

The concept of multileveled analysis, derived from Schoenberg's notion of monotonality, is important to these graphing techniques. Modulation is viewed as a local event in a series of structural levels; that is, on its own level, the new tonic may be of primary significance, while at a broader level of implication it may appear as an expansion of a primary tonal system. Therefore, regions may have several interpretations simultaneously.

The graphs of the tonal regions show the most significant region (in this case the primary tonic of the movement) at the bottom; the regions then ascend in order to the least significant region at the top. The regions are shown from left to right in order of appearance in the movement. Roman numerals in the right-hand column indicate the function within the primary tonic system. Vertical boxes help to clarify the multilevel analysis; that is, the relationship of regions to each other. Diatonic connections among the parts of the expanded tonal system are indicated within each box; only those regions which have such connections are included.

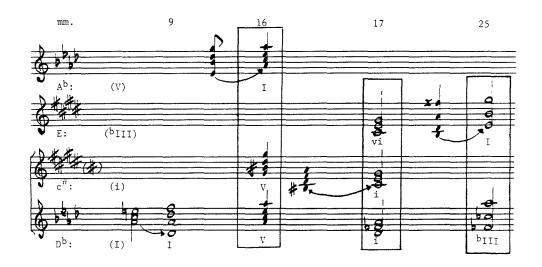
The symbology used to express the hierarchy is a system of descending durational values, with the largest value representing the most significant region (the one which extends its influence over the broadest level of structure):

Beginning with Schubert, composers operated on the principle that major and minor are different sides of the same coin; Beach is not an exception. Therefore, major and minor modes on the same tonic are considered to be essentially the same region.

Implied tonal regions are defined here as any tonicization (by secondary dominant, leading tone, linear motion, etc.) of a pitch or triadic structure which could be con-

sidered to represent a tonal center. The durations of these tonicizations will be extremely brief for some structures and will seldom be firmly established or confirmed as stable key areas. Nevertheless, the charting of implied regions can give an idea of the relative tonal fluctuation in one thematic presentation as compared to another. The implied tonal centers are also ordered to show relationships between the regions within a single passage. Example 6 represents the implied regions of mm. 1-25 in terms of relatively large

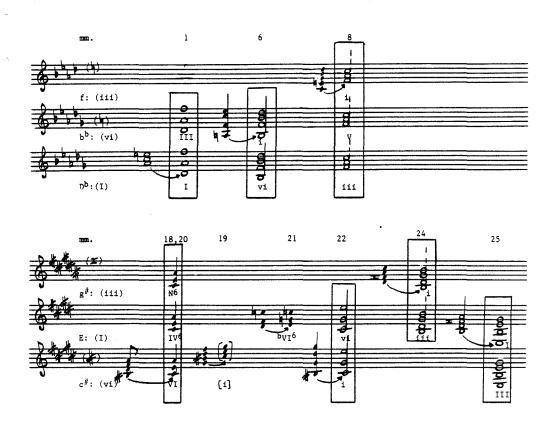
Example 6. Tonal Regions, mm. 1-25.



gestures. D<sup>b</sup> major (mm. 1-16) is the most significant area, and E major, which is tonicized at mm. 24-25 and somewhat stable through m. 32, is the second-order area. These areas are enharmonically third-related. This representation of the passage is more abstract in style than the metric reductions and charts of harmonic progressions but serves a useful purpose in that perspective is gained by the inclusion of fewer details.

Further information is shown in Example 6, which details regions in mm. 1-8 and mm. 17-25 for comparison. The same criteria for ordering are operative, but levels are arranged to illustrate the third relationships. Interaction between levels is very complex in mm. 17-25; this supports the idea, suggested by the metric reductions, that this section is transitional. Data such as information about third rela-

Example 7. Tonal Regions, Third Relationships, mm. 1-8 and 17-25.



tionships thus can be used in conjunction with other vertical models to clarify the tonal picture and show similar ideas expressed on different levels.

LINEAR REDUCTIONS. Linear models complement the vertically-oriented examples presented so far by showing more clearly the role of outer voices in influencing the harmony. Reductive methods borrowed from Heinrich Schenker's techniques are used, with some modifications and limitations. Reduction will be applied here only to short-range passages and will be limited primarily to outer voice motions for the purpose of clarifying details of linear activ-

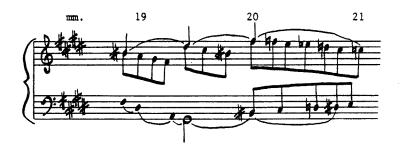
ity left unclear in previous graphs. Two levels are generally shown, but both would be considered foreground levels. No further reductions to higher levels are made since the chromaticism being investigated lies principally in the foreground.

Structural significance is indicated by the following symbols shown in descending order:

Other symbols are used as follows:

- Beams connect a series of step-related structural pitches.
- Slurs connect arpeggiations of two step-related pitches.
- Dashes between noteheads indicate a retained structural pitch.

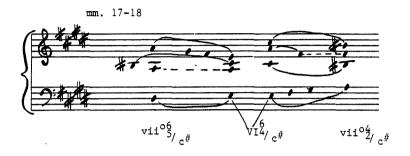
Example 8. Linear Sketch, mm. 19-21.



An example of a short-range application is shown in Example 8. Linear chromaticism obscures the clarity of harmonic motion, thereby emphasizing the convergence of the outer lines on C and E in m. 21. The previously implied tonic was  $C^{\sharp}$  minor (by implication from the major-minor seventh at the end of m. 19). The linear motion thus temporarily tonicizes C major in a deceptive gesture, delaying the expected resolution to  $C^{\sharp}$  minor until the second half of m. 22.

By including some inner voices, deceptive resolutions of diminished-seventh chords can be explained in linear terms. This procedure is useful only for showing detail in one or two measures of music. Example 9 shows that in mm. 17-18 the diminished-seventh chord to A major by retaining the pitch A and moving by half-step to C<sup>#</sup> and E. The expected resolution to C<sup>#</sup> minor is, however, expressed by the repetition of the pitch C<sup>#</sup> in the second violin line. The similarity of linear structure between mm. 1-9 and mm. 17-25

Example 9. Linear Sketch, mm. 17-18.



is more apparent in the graphs of Example 10 than in the vertical models. The arpeggiations  $D^b-A^b-F$  (mm. 7-9) and  $E-B-G^{\#}$  (mm. 23-35) confirm the tonal regions shown in Example 6. The linear arpeggiations of the diminished-seventh chord built on  $D^{\#}$  in the upper voice (mm. 17-20) clarify the relationship of this unstable eight-measure section with the E-major section which follows it, since the arpeggiation can be interpreted as a linear form of a vii $^{\circ}$ 7 in that key. The move to E major is not vertically confirmed until the authentic cadence at the end of m. 24, demonstrating that linear and cadential tonicization do not always coincide. Therefore, a comparison of linear and vertical reductions helps prevent possible misinterpretations.

MOTIVIC CHARTS. The charts in Example 10 show a selected representation of thematic fragments as they appear throughout the movement. These models serve as an adjunct to the linear reductions.

Mm. 1-2 are never significantly extended or elided in the parallel statements. Inversions occur in mm. 17-18 and mm. 120-121, and the size of intervals contained in this part of the theme is often altered in other presentations. Such alterations are sometimes paralleled in the supporting chord progressions; for example, the motivic inversion in mm. 17-18 is matched by a diminished-seventh harmony. In another instance, the emphasis on bVI in mm. 14 and 17-23 is reflected in the motivic change in mm. 76-77 ( $F^{b}-B^{bb}-D^{b}$ ).

The alterations of the ending of the theme always retain the  $\frac{6}{4}$  meter. Two different melodic contours are modified alternately, each originally supported by functional dominant chords. Alterations sometimes confirm harmonic changes (a deceptive resolution in m. 103) or show an extension of the motive as in mm. 109-114 in order to support a tonal resolution (in this case to a Db pedal point, which continues to the end of the movement).

Example 10. Linear Reductions, mm. 1-9 and 17-25.



CONCLUSIONS. Chromaticism is not merely linear interpolation, nor does it consist only of secondary dominants and other altered chords. Instead, chromatic music is the result of the interaction of both melodic and harmonic functions. Chromaticism has a diatonic model as its underlying skeletal frame up to a certain saturation point; in Beach's

Example 11. Motives.



Quintet this point has not been reached. Although a highly chromatic work, diatonic harmony still provides the points of reference.

Successive thematic statements, where each is chromatically varied from the original, expand the tonal resources of the primary tonic by:

- 1. Alteration of a diatonic chord (vi-bVI).
- Addition of dissonance (vi-vi<sup>7</sup>; V-V<sup>+</sup>).
- 3. Enharmonic changes and movement to other regions.
- 4. Modal borrowing.
- 5. Reharmonization using less stable chords ( $vii^{\circ}7$ ,  $ii^{\circ}$ ).
- Inserting additional chords to expand the progression or to delay the resolution.
- 7. Addition of melodic chromatic inflections which do not necessarily affect the harmonic support.

Obviously, there are advantages and disadvantages to each approach used in the previous analyses. The results obtained from applying each technique influenced the results of the next approach, since data already assembled could be used in making decisions. Far from being undesirable, this is precisely the sort of interaction needed to support a valid interpretation of the materials under analysis. Each technique has weaknesses which can be shored up by correlating data from other approaches. A system of checks and

balances thus begins to operate, thereby preventing lopsided views of chromatic passages.

Example 12. Beach, Quintet, Mvt. II. mm. 1-34.







Copyright © 1909 A. P. Schmidt Co., Evanston, Illinois Copyright renewed.