This supplement provides the new sections added to the 2019 MMTA Theory Level 3 Workbook.

*Please note these general changes:*  
- Rounded binary form has been removed from this level.  
- Authentic cadences are now referred to as "authentic or full cadences."  
- The V chord is always referred to as the V7 chord.

Note: This supplement is meant to be used with the 2015 edition of the MMTA Music Theory Level 3 Workbook. This supplement may only be reproduced for use with such a workbook.
5-2: Triads

A **triad** is a chord with three notes and is stacked in thirds.
- The **root** is the lowest note and is the name of the triad.
- The **3rd** is the interval of a 3rd above the lowest note.
- The **5th** is the interval of a 5th above the lowest note.

The two most common triads are:

**Major triads**: They come from 1 - 3 - 5 in the major pentascale (the first, third, and fifth notes of the scale).

**Minor triads**: They come from 1 - 3 - 5 in the minor pentascale (the first, third, and fifth notes of the scale).

Example of triads:

![Example of triads](image)

- **F major**
  - C is the 5th.
  - A is the 3rd.
  - F is the root.

- **C# minor**
  - G# is the 5th.
  - E is the 3rd.
  - C# is the root.

- **Bb major**
  - F is the 5th.
  - D is the 3rd.
  - Bb is the root.

- **D minor**
  - A is the 5th.
  - F is the 3rd.
  - D is the root.

For each triad below:
- Indicate which note is the root, the 3rd, and the 5th.
- Then name each chord by letter and quality.

*(The first one is done for you.)*

![Diagram with notes](image)

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<tbody>
<tr>
<td>Chord 1</td>
<td>Chord 2</td>
<td>Chord 3</td>
<td>Chord 4</td>
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<tr>
<td>Root = G</td>
<td>3rd = B</td>
<td>5th = D</td>
<td>Chord = G major</td>
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<td>Root =</td>
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5-3: Triads and Inversions

To make music more interesting and harmonies flow more smoothly, composers can rearrange the notes of the chord. When the 3rd or the 5th is the lowest note, the triad is inverted. To find the root note of an inverted triad, look for the upper note of the fourth in the chord.

1. Root = _____ A♭ _______ Chord = _____ A♭ major _______
2. Root = _______ Chord = _____________
3. Root = _______ Chord = _____________
4. Root = _______ Chord = _____________
5. Root = _______ Chord = _____________
6. Root = _______ Chord = _____________
7. Root = _______ Chord = _____________
8. Root = _______ Chord = _____________
9. Root = _______ Chord = _____________
10. Root = _______ Chord = _____________
Written Practice: Triads and Inversions

Identify the root note for each triad below. (You do not need to identify the quality of the triad or the inversion.)

1. 

2. 

3. 

4. 

5. 

6.
5-4: Seventh Chords

A seventh chord is a chord with four notes and is stacked in thirds.
- The root is the lowest note. The name of the chord is the root note + Arabic numeral 7, e.g. C7.
- The 3rd is the interval of a 3rd above the lowest note.
- The 5th is the interval of a 5th above the lowest note.
- The 7th is the interval of a 7th above the lowest note.

For each chord below,
- Indicate which note is the root, the 3rd, the 5th, and the 7th.
- Then name each chord by letter and quality.

(The first one is done for you.)

1. Root = G 3rd = B 5th = D 7th = F Chord = G7

2. Root = ______ 3rd = ______ 5th = ______ 7th = ______ Chord = ______

3. Root = ______ 3rd = ______ 5th = ______ 7th = ______ Chord = ______

4. Root = ______ 3rd = ______ 5th = ______ 7th = ______ Chord = ______
5-5: Tonic (I), Dominant (V), and Dominant Seventh (V\(^7\)) Chords in Major Keys

A chord can be built on any step of the scale using pitches from the scale. The most important and most used chords are the I, V, and V\(^7\) chords. These chords have a certain purpose, or function, in music. Chords that "do" things are called functional harmony.

The **tonic** triad (I)
- Is a three-note chord (a triad) built on 1 (1, 3, 5).
- The tonic triad is labeled I.
- The function of the tonic triad is to sound stable because it is the "home" chord.

The **dominant** triad (V)
- Is a three-note chord (a triad) built on 5 (5, 7, 2).
- The dominant triad is labeled V.
- The function of the dominant triad is to lead to the tonic. It wants to "go" or to "resolve" to the tonic.

The **dominant seventh** chord (V\(^7\))
- Is a four-note chord (seventh chord) built on 5 (5, 7, 2, 4).
- The dominant seventh chord is labeled V\(^7\).
- The function of the dominant seventh chord is also to lead to the tonic. It wants to "go" or to "resolve" to the tonic.
- V\(^7\) sounds more unstable than V.

**Example: Tonic and dominant triads on the D major scale**
- The first triad is labeled I because it is built on the first note of the scale. This triad is the tonic triad.
- The fifth triad is labeled V because it is built on the fifth note of the scale. This triad is the dominant triad.

In the example below, the scale has been removed and only the chords remain. Notice the last chord adds another note (the seventh) and it becomes the V\(^7\).

```
I    V

I    V    V\(^7\)```

New section on pages 24-25 of 2019 edition
On the F major scale below,
- Write the tonic triad on 1 and label it with I.
- Write the dominant triad on 5 and label it with V.

Now, write the chords alone on this staff.

Then, write the chords in a different major key. (Teacher: Please select a key for the student.)
5-6: Tonic (i), Dominant (V), and Dominant Seventh (V7) Chords in Minor Keys

In minor keys:

The **tonic** triad (i)
- Is a three-note chord (a triad) built on 1 (1, 3, 5).
- The tonic triad is labeled as i. Lowercase Roman numerals are used to indicate minor, and uppercase letters to indicate major.
- The function of the tonic triad is to sound stable because it is the “home” chord.

The **dominant** triad (V)
- Is a three-note chord (a triad) built on 5 (5, 7, 2).
- When a chord is built on the dominant pitch using only notes of the natural minor scale, it is weak because it has no leading tone. Composers usually add the leading tone (#7) to the dominant chord so that it has a stronger pull to the tonic. In other words, the 7th of the scale, which is the 3rd of the chord, is raised so the chord will function as a dominant. This always involves an accidental.
- The dominant triad is labeled as V or V#. In this curriculum, the sharp after the V is optional.
- The function of the dominant triad is to lead to the tonic. It wants to “go” or to “resolve” to the tonic.
- The V triad is always major.

The **dominant seventh** chord (V7)
- Is a four-note chord (seventh chord) built on the fifth step of the scale.
- The 3rd of the chord must be raised a half step to make the chord function as a dominant. This will always involve an accidental.
- The dominant seventh chord is labeled as V7 or V#7. In this curriculum, the sharp after the V is optional.
- The function of the dominant seventh chord is also to lead to the tonic. It wants to “go” or to “resolve” to the tonic.
- V7 sounds more unstable than V.

**Example: Tonic and dominant triads on the B minor scale**
- The tonic triad is a three-note chord built on 1. It is labeled i. This triad is the tonic triad.
- The dominant triad is a three-note chord built on 5. Notice the third is raised with a sharp. It is labeled V. This triad is the dominant triad.

In the example below, the scale has been removed and only the chords remain. Notice the last chord adds another
Tonic (i), Dominant (V), and Dominant Seventh (V\(^7\)) Chords in Minor Keys, continued

On the D minor scale below:
- Write the tonic triad on the first pitch and label it with i.
- Write the dominant triad on the fifth pitch and label it with V. Remember to raise the third of the V chord.

Now, write the chords alone on this staff.

Then, write the chords in a different minor key. (Teacher: Please select a key for the student.)
More Practice Writing Tonic and Dominant-Seventh Chords

For each example,
- Write the key signature at the start of the staff.
- Write the tonic (I, i) and dominant seventh (V\(^7\)) chords in root position and in whole notes.
- In minor keys, remember to raise the third on the \(V^7\) chord.

Example: F major

![F major chord diagram]

F: I \(V^7\)

1. C major

![C major chord diagram]

C: I \(V^7\) I \(V^7\)

2. G major

![G major chord diagram]

G: I \(V^7\) I \(V^7\)

3. D major

![D major chord diagram]

D: I \(V^7\) I \(V^7\)

4. A minor

![A minor chord diagram]

a: i \(V^7\) i \(V^7\)
5. B♭ major

\[ B♭ : \begin{array}{cccc}
I & V^7 & I & V^7 \\
\end{array} \]

6. B minor

\[ b : \begin{array}{cccc}
i & V^7_\# & i & V^7_\# \\
\end{array} \]

7. F major

\[ F : \begin{array}{cccc}
I & V^7 & I & V^7 \\
\end{array} \]

8. D minor

\[ d : \begin{array}{cccc}
i & V^7_\# & i & V^7_\# \\
\end{array} \]

9. G minor

\[ g : \begin{array}{cccc}
i & V^7_\# & i & V^7_\# \\
\end{array} \]

10. E minor

\[ e : \begin{array}{cccc}
i & V^7_\# & i & V^7_\# \\
\end{array} \]
Analysis 1: Leopold Mozart, *Menuet*

1. To determine the key, follow these steps:
   a. First, look at the key signature. How many sharps or flats do you see? 
   b. Then ask, what major key has two sharps? 
   c. What minor key has two sharps? 
   d. What is the last, lowest note of the piece? 
   e. Using the key signature and the last note, what key is this piece in? 

2. To determine harmonies, follow these steps:

   Look at the lowest (lower staff, left hand) note. This pitch is often the root, or name, of the chord.

   But check! Are the other pitches of the chord in the other parts or hands?

   What pitches are on the first beat? and 

   Do these pitches mostly make the I, V, or V\(^7\) chord? 

   Which note is missing from the chord? 

3. Provide a harmonic (Roman numeral) analysis. Write I, V, or V\(^7\) on each blank.
Analysis 2: A. Diabelli, Op. 125, No. 4

1. In what key is this piece written? ________________

2. The form of this piece is binary. A repeat sign separates the two sections. Give measure numbers for each section.
   
   A = measures ________________
   
   B = measures ________________

3. Provide a harmonic (Roman numeral) analysis for each blank.

4. A cadence is the harmony at the end of a phrase.

   What are the last two harmonies (chords) in this piece? _______ and _______

   A half cadence ends on a V chord. An authentic/full cadence ends V7-I.

   Does this piece end with a half or authentic/full cadence? (Circle one.) Half  Authentic/full
Analysis 3: W.A. Mozart, *Minuet, K.6*

1. In what key is this piece written? 

2. What is the form? 

3. Give measure numbers and letters for each section.

4. Provide a harmonic (Roman numeral) analysis for each blank.

5. What kind of cadence ends the piece? *(Circle one.)* Half Authentic/full

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*Analysis with new questions from page 38 of 2019 edition*
1. Notice this piece has a D.C. al Fine, which means the piece does not end in measure 18! In which measure does this piece end? (Hint: Look for the “Fine”.) __________

2. In what key is this piece written? __________

3. What is the form? (Hint: Remember D.C. al Fine.) __________

4. Give measure numbers and letters for each section. ____________________________________________________________________________

5. Provide a harmonic (Roman numeral) analysis for each blank.

6. Identify each cadence as half or as authentic/full.

   Measures 7-8: __________ Measures 9-10: __________ Measure 15-18: __________
1. Once again, to determine the key of a piece, look at the key signature. This piece has an internal section in another key.

   In what key does this piece begin?

   Beginning in measure 6, the piece **modulates**, or changes key.
   Now, many F#'s appear. What major key has F#'s?

2. Provide a harmonic (Roman numeral) analysis for each blank.

3. Find and circle two 8ths (octaves) in the right hand.

4. Find and circle two 8ths (octaves) in the left hand.

   **New Key! G major:**
1. In what key is this piece written? 

2. Provide measure numbers for each section:
   
   A section = 
   B section =  
   
   You may notice the A section theme returns. Where does it return?

3. Provide a harmonic (Roman numeral) analysis for each blank.

4. Identify each cadence as half or authentic/full:
   
   Measure 16:  
   Measures 23-24:  


Analysis with new questions from page 41 of 2019 edition

Answers on p. 85
**Written Section 5: Tonic and Dominant Triads**

5-2: Triads

1. G/B/D, G major
2. C/E/G, C minor
3. E/G/B, E major
4. D/F/A, D minor
5. A/C/E, A major

5-3: Triads and Inversions

1. A\(^b\), A\(^b\) major
2. E, E major
3. D\(^b\), D\(^b\) minor
4. E, E minor
5. C\(^\#\), C\(^\#\) minor
6. B\(^b\), B\(^b\) major
7. F, F minor
8. G\(^b\), G\(^b\) minor

**Written Practice: Triads and Inversions**

1. A, D\(^b\), F, C, E
2. F\(^\#\), B\(^\#\), G, E, G
3. G, F, A, B
4. A, B, G, D
5. G, D, E, E, B

5-4: Seventh Chords

1. G/B/D/F, G\(^7\)
2. E/G\(^\#\)/B/D, E\(^7\)
3. F/A/C/E\(^b\), F\(^7\)
4. B/D/F/A, B\(^7\)
5-5: Tonic (I), Dominant (V), and Dominant Seventh (V7) Chords in Major Keys

\[ \begin{array}{c}
F: \quad \text{Tonic} (I), \text{Dominant} (V), \text{Dominant Seventh} (V7) \\
\end{array} \]

5-6: Tonic (i), Dominant (V), and Dominant Seventh (V7) Chords in Minor Keys

\[ \begin{array}{c}
d: \quad \text{Tonic} (i), \text{Dominant} (V), \text{Dominant Seventh} (V7) \\
\end{array} \]

More Practice Writing Tonic and Dominant-Seventh Chords

1. C major

\[ \begin{array}{c}
C: \quad \text{Tonic} (I), \text{Dominant} (V), \text{Dominant Seventh} (V7) \\
\end{array} \]

2. G major

\[ \begin{array}{c}
G: \quad \text{Tonic} (I), \text{Dominant} (V), \text{Dominant Seventh} (V7) \\
\end{array} \]

3. D major

\[ \begin{array}{c}
D: \quad \text{Tonic} (I), \text{Dominant} (V), \text{Dominant Seventh} (V7) \\
\end{array} \]

4. A minor

\[ \begin{array}{c}
a: \quad \text{Tonic} (i), \text{Dominant} (V), \text{Dominant Seventh} (V7) \\
\end{array} \]

5. B♭ major

\[ \begin{array}{c}
B♭: \quad \text{Tonic} (I), \text{Dominant} (V), \text{Dominant Seventh} (V7) \\
\end{array} \]

6. B minor

\[ \begin{array}{c}
b: \quad \text{Tonic} (i), \text{Dominant} (V), \text{Dominant Seventh} (V7) \\
\end{array} \]

7. F major

\[ \begin{array}{c}
F: \quad \text{Tonic} (I), \text{Dominant} (V), \text{Dominant Seventh} (V7) \\
\end{array} \]

8. D minor

\[ \begin{array}{c}
d: \quad \text{Tonic} (i), \text{Dominant} (V), \text{Dominant Seventh} (V7) \\
\end{array} \]

9. G minor

\[ \begin{array}{c}
g: \quad \text{Tonic} (i), \text{Dominant} (V), \text{Dominant Seventh} (V7) \\
\end{array} \]

10. E minor

\[ \begin{array}{c}
e: \quad \text{Tonic} (i), \text{Dominant} (V), \text{Dominant Seventh} (V7) \\
\end{array} \]
Chapter 2. Analysis

**Analysis 1: Leopold Mozart, Menuet**
1. a. 2 sharps
   b. D major
   c. B minor
   d. D
   e. D major
2. a. D and F

**Analysis 2: A. Diabelli, Op. 125 no. 4**
1. C major
2. A = 1-8,
   \[ B = 9-16 \]
3. I, I, I, I, I, I

**Analysis 3: W.A. Mozart, Minuet, K. 6**
1. C major
2. Binary
3. A = 1-8,
   \[ B = 9-16 \]
4. I, V, V\(^7\), I

**Analysis 4: C. Gurlitt, The Little Flower, Op. 205 no. 11**
1. Measure 10
2. B minor
3. Ternary
4. A = 1-10
   \[ B = 11-18 \]
   \[ A' = 1-10 \text{ (D.C.)} \]

**Analysis 5: M. Clementi, Sonatina, Op. 36 no. 1 (I., excerpt)**
1. a. C major
   b. G major
2. I, I, V, I
   I, V, I, I
   V, I

**Analysis 6: R. Schumann, Soldier's March, Op. 68 no. 2**
1. G major
2. A = 1-8
   \[ B = 9-24 \]
   A returns in m. 17
3. I, I, V\(^7\), I
   I, V
   V, I, V
   I, V, I, I, I
   V\(^7\), I, V, V, I

*Exercises on p. 36*

New analysis answer key from page 85 of 2019 edition