Name: _____

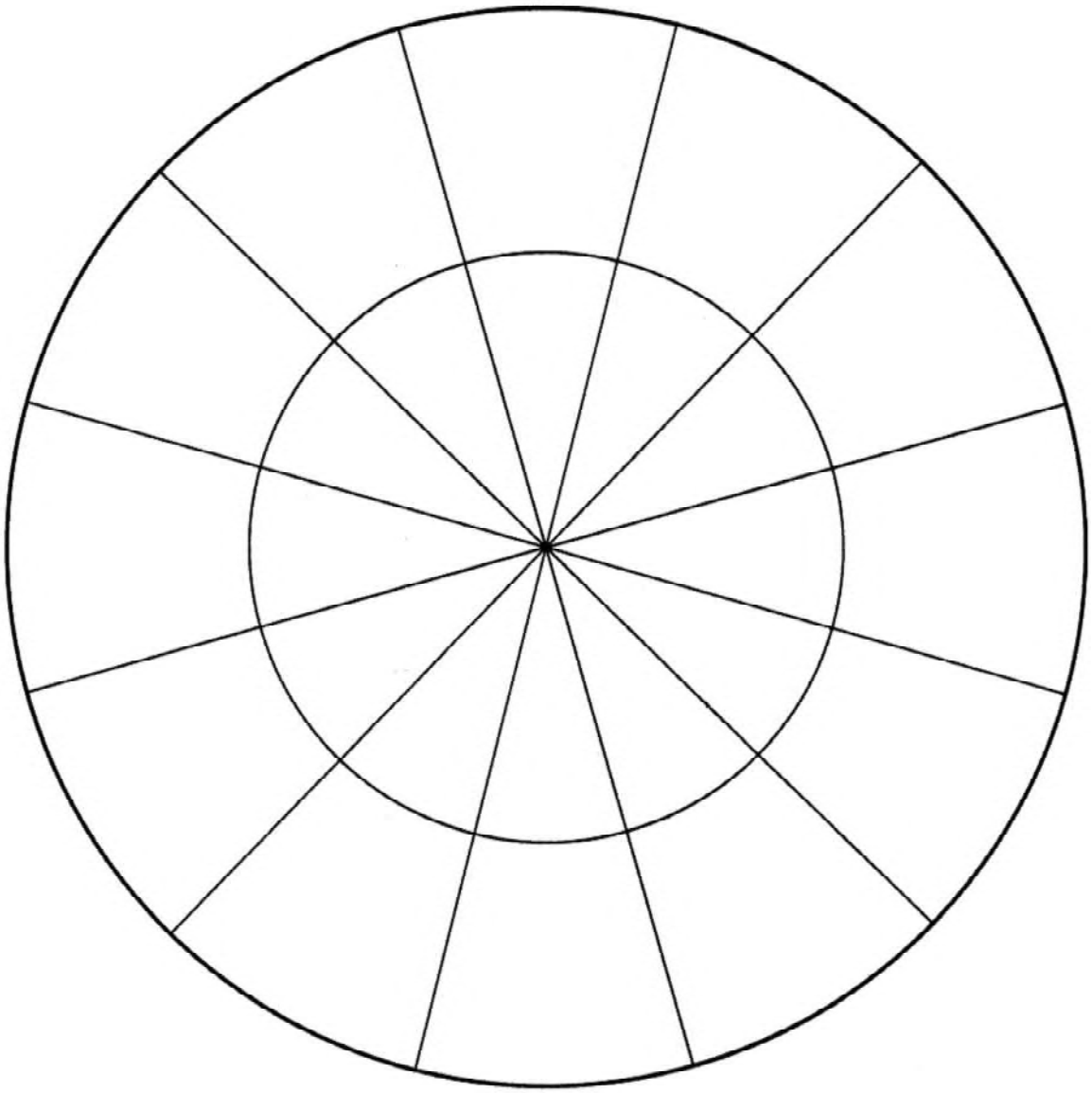
Unit: _____

Cadet Music Theory Workbook

Level Three

Updated 11 Feb 20

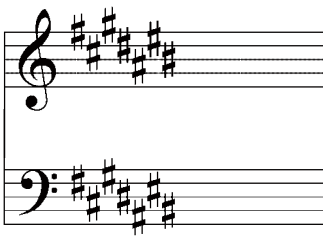
Circle of Fifths—Blank



Sharps

F#, C#, G#, D#, A#, E#, B#
(Father Charles Goes Down And Ends Battle)

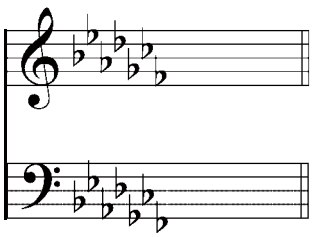
Placement on the staff:



Flats

B♭, E♭, A♭, D♭, G♭, C♭, F♭
(Battle Ends And Down Goes Charles' Father)

Placement on the staff:

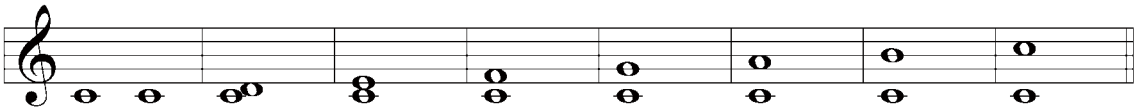


4. As you studied in Level Two, an interval is the distance of pitch between two notes. We also studied the specific names for the size (2nd, 3rd, 4th, etc.) and quality (major, minor) of each interval.

5. Notice that the unison, fourth, fifth, and octave are called PERFECT, but the second, third, sixth, and seventh, can be called MAJOR or MINOR. All intervals are named, as the lower note is, for the moment, the TONIC.

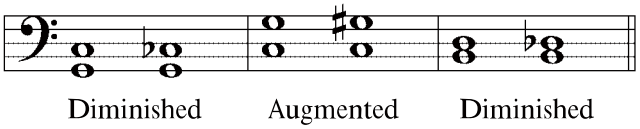
Perfect	Major or Minor
unison	second (2nd)
fourth (4th)	third (3rd)
fifth (5th)	sixth (6th)
octave (8ve)	seventh (7th)

6. To determine the nature of each interval, we can use the major scale as a reference point, because all intervals are perfect or major depending on the type of interval.



7. The word AUGMENTED means "made larger". When a perfect or major interval is made larger by a half step or semitone, it becomes an Augmented Interval.

8. The word DIMINISHED means "made smaller". When a perfect or minor interval is made smaller by a half step, it becomes a Diminished Interval.

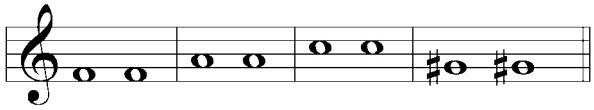


9. To simplify the terms minor, augmented, etc., they can be written as outlined in the chart below. Either method is acceptable but remember to stick to one or you may become confused.

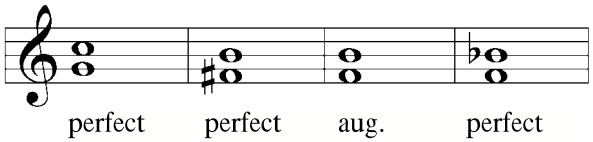
Major	M	+
Minor	m	-
Augmented	aug	x
Diminished	dim	o

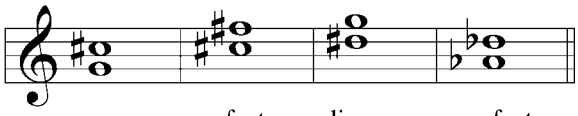
10. After having been able to qualify the second intervals in Level Two, you will now learn how each perfect interval is composed (unison, 4th, 5th, 8ve).

Unison: Two notes or more of the same sound is a Unison.

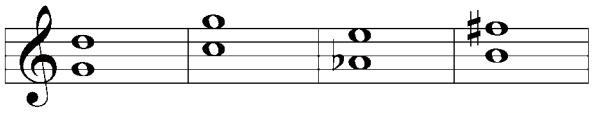


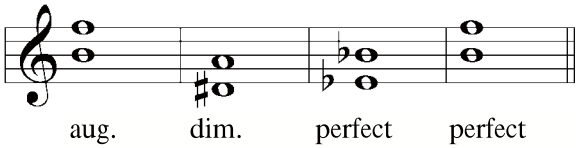
Fourth: All notes that have the same accidentals (♯ to ♯) are perfect except F and B and their derivatives (F♯ and B♯, etc). To obtain a perfect fourth between these two notes, the interval has to have a F♯ and a B or an F and a B♭. As mentioned above, if the interval is a semitone larger, it becomes augmented. If the interval is a semitone smaller, it becomes diminished (4th = 2½ tones)



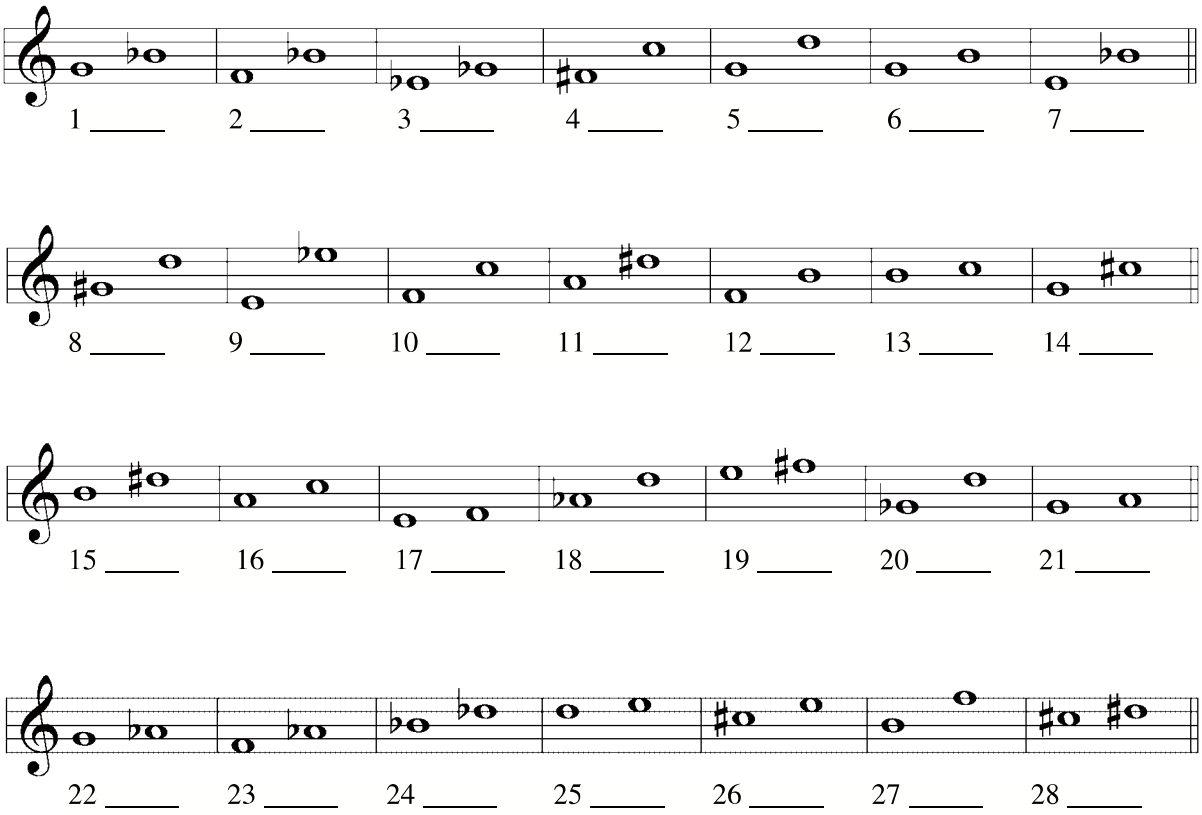


Fifth: The same rule applies with this interval as the fourth (5th = 3½ tones)

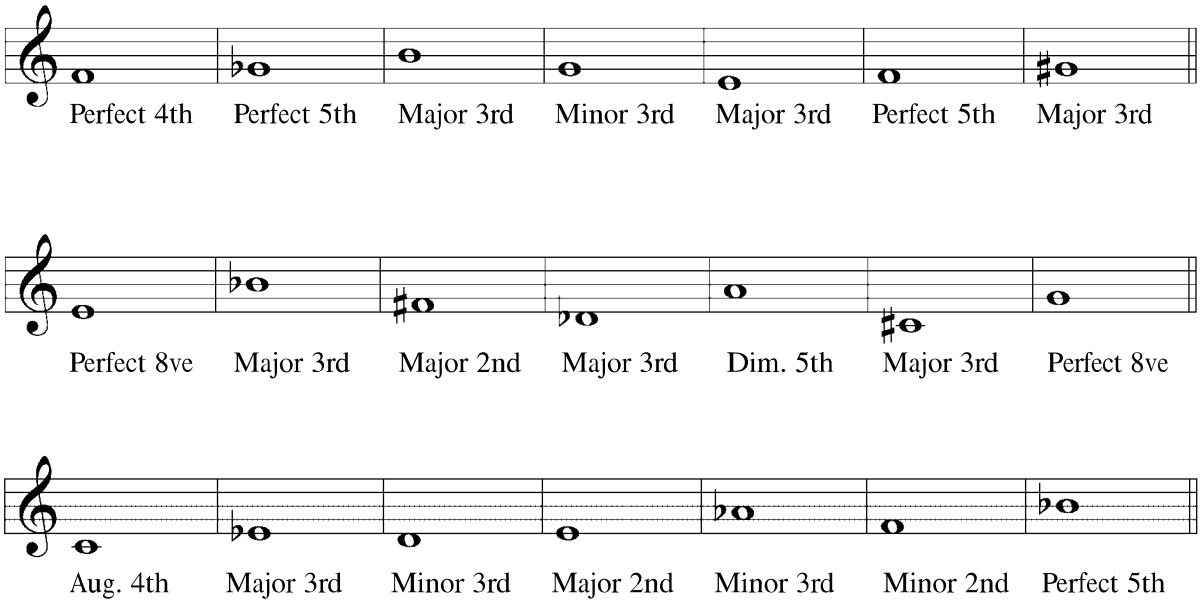




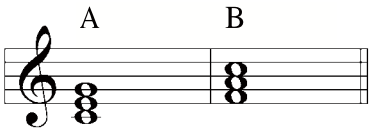
B) Identify and name the following intervals:



C) Complete the following intervals:

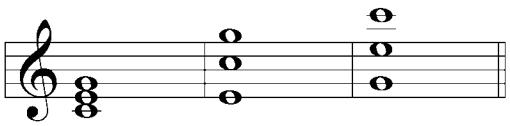


16. A chord is the name given to any three or more notes sounded simultaneously. The most basic chord is a TRIAD, that is, three sounds built up in thirds.

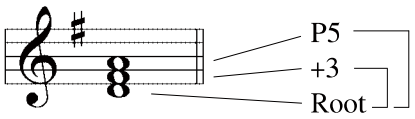


17. These triads may be built on each degree of major and minor scales. The note that they are built on, that is, the lowest note, is called the ROOT (C – of the C major scale) of the triad. The next note is a diatonic third above the root and it is named the THIRD (E), and the third sound is a diatonic fifth above the same root called the FIFTH (G).

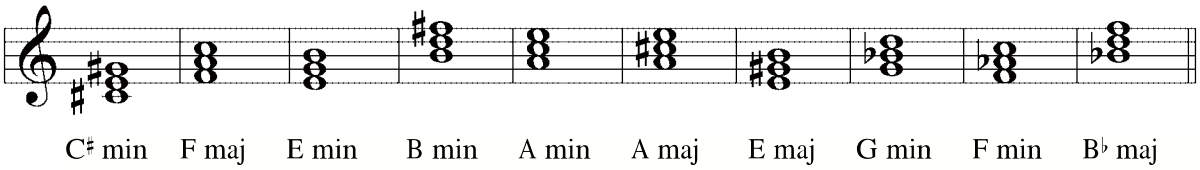
18. No matter how the notes are placed on the staff, the chord remains the same. For example, these three chords (below) all belong to the chord of C major.



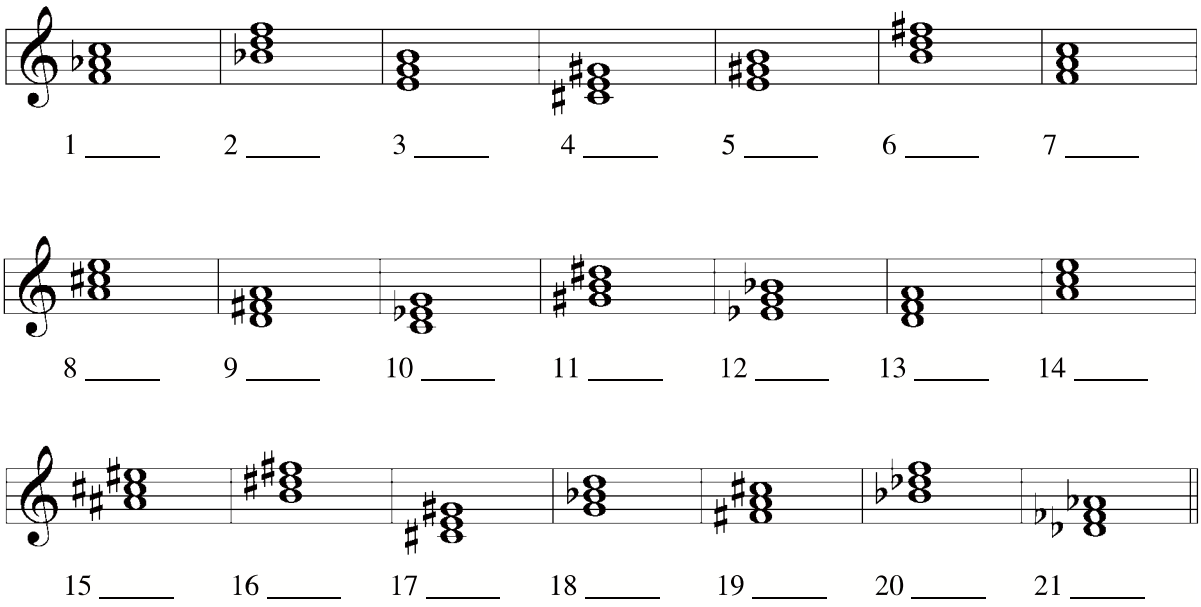
19. A major perfect chord is composed of a root, a major third, and a perfect fifth. A minor chord is composed of a root, a minor third, and a perfect fifth.



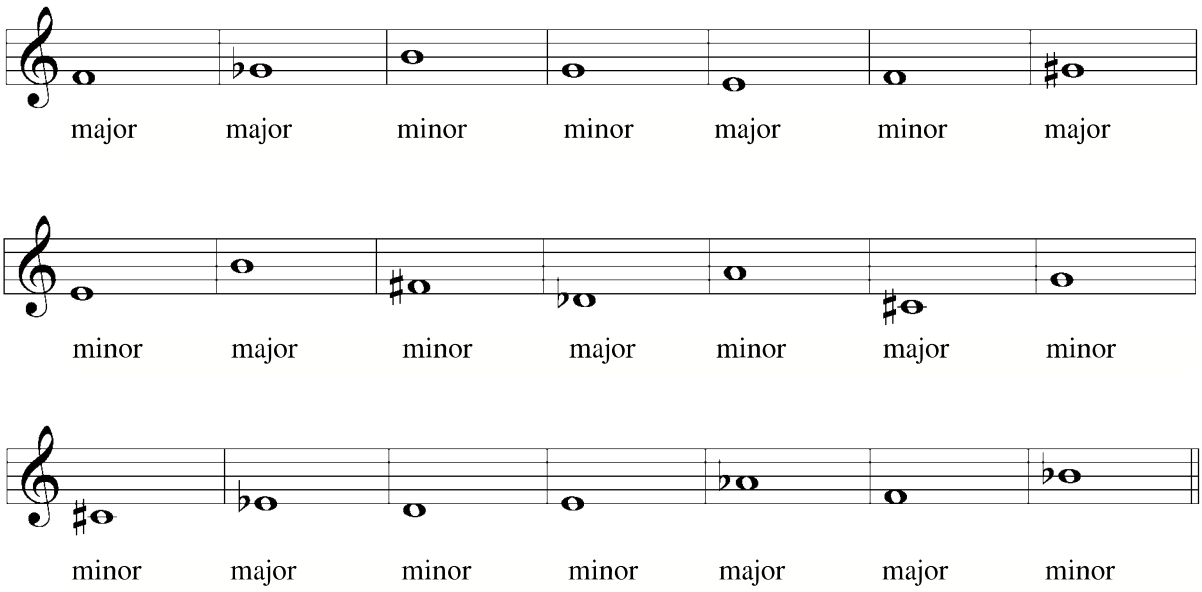
20. You can therefore state that it is the nature of the third that will determine if the chord is major or minor. On the other hand, the perfect fifth belongs to both chords. Examine the following examples of the major and minor chords.



A) Name the following chords (major or minor)



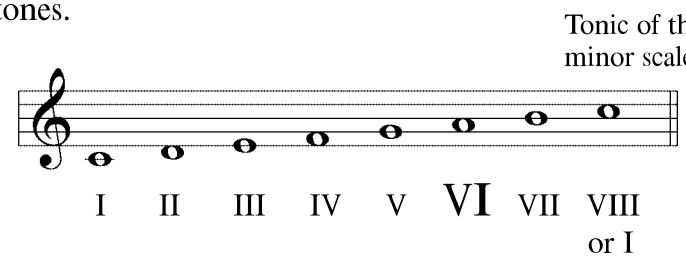
B) Compose the following chords



12. minor scales come in three forms: the natural minor, the harmonic minor, and the melodic minor scales. We have seen the first two scales, now it is time to study the third - the MELODIC MINOR SCALE.

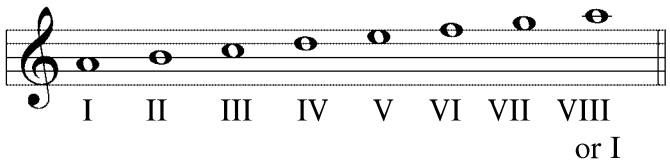
13. You remember that to find the tonic of the relative minor scale, you either take the sixth scale degree of the major scale or take the tonic and move backwards three semitones.

C Major



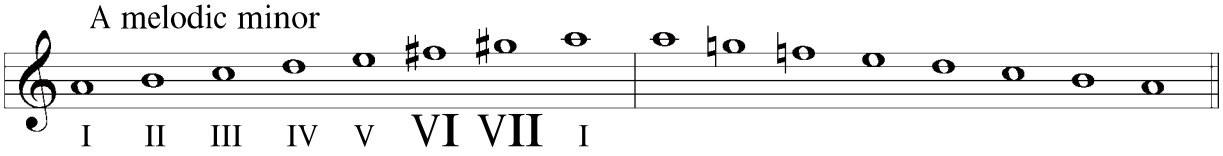
14. Taking this new note as tonic, you create another scale (a series of 8 adjacent notes) and you keep the key signature of the major scale.

A minor



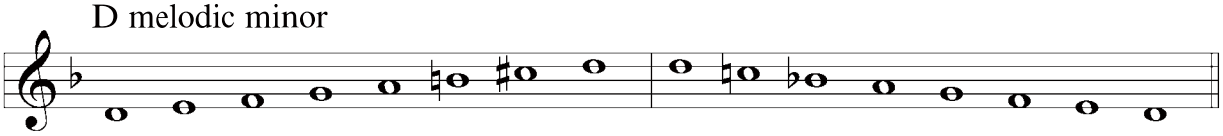
15. To find a melodic minor scale from the natural minor, you have to raise the VI and VII scale degrees a semitone higher when ascending and then lower them a semitone when descending returning them to their natural state according to the key signature.

A melodic minor



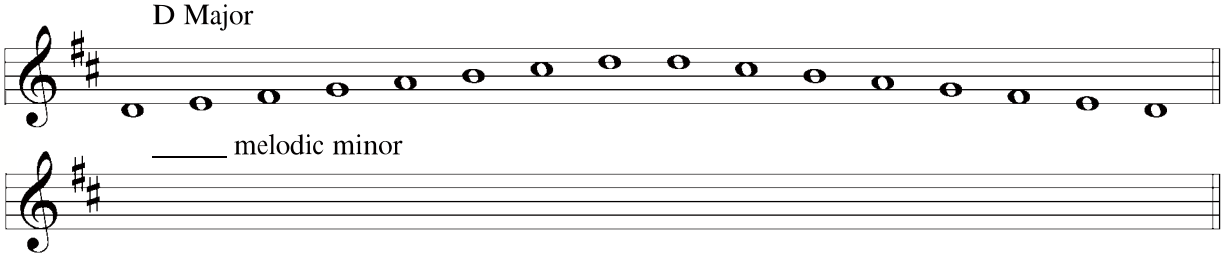
In another key Relative **minor** scale of F **Major**

D melodic minor



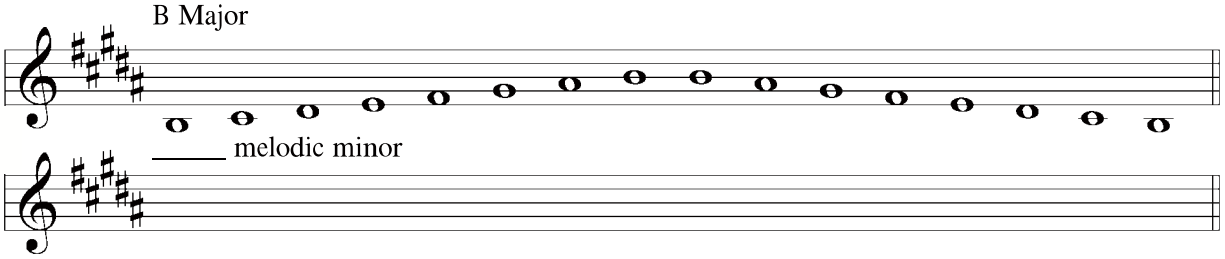
A) Construct the melodic minor scale of the following major scales (ascending and descending).

D Major



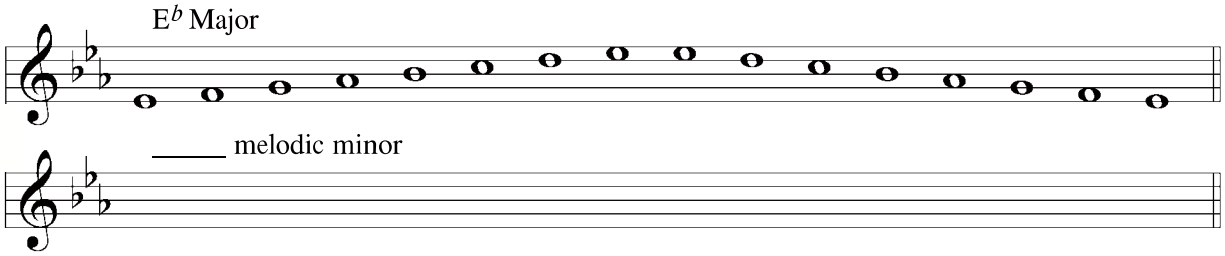
_____ melodic minor

B Major



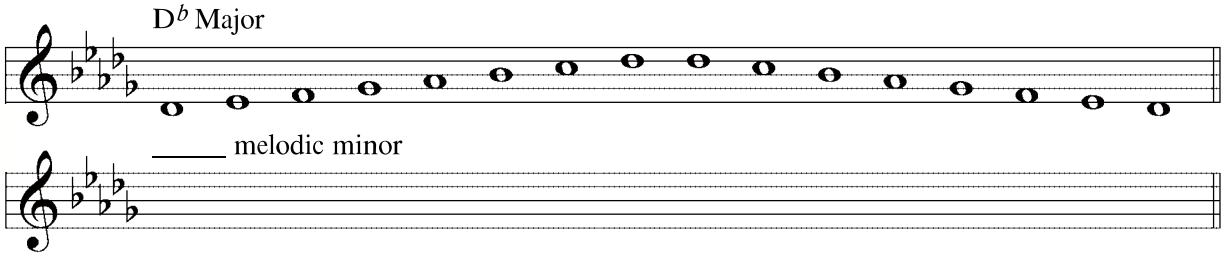
_____ melodic minor

E^{b} Major



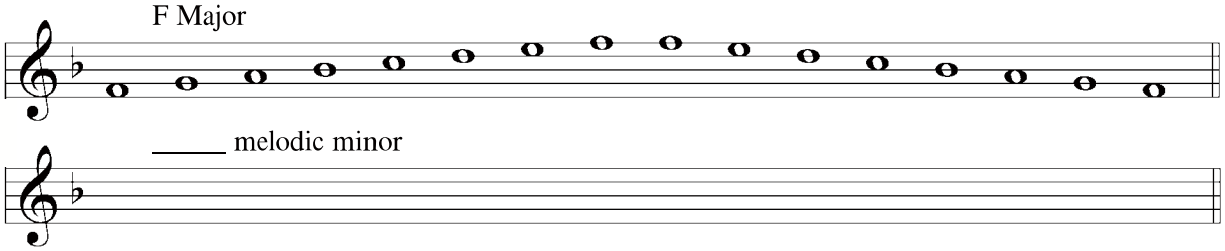
_____ melodic minor

D^{b} Major



_____ melodic minor

F Major



_____ melodic minor

To Find the Key of a Given Melody

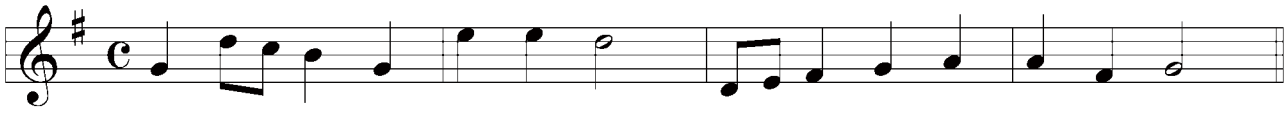
10. Each musical piece is written in a key. This key is determined by what is found in the key signature. Each key is determined by a grouping of sharps or flats written at the beginning of the musical piece. This key signature makes it unnecessary to write repeated accidentals throughout the music.

11. Given the key signature and a melody, the music may be written in either the major or minor key.

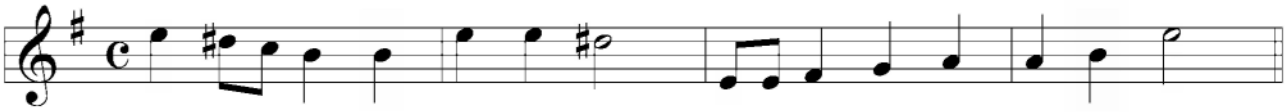
12. Apart from the key signature, there are other reference points that could help in determining the key of a musical piece. Firstly, the last note of the piece is usually the tonic of the key used. Secondly, a melody in a minor key will usually contain an accidental beside the raised seventh.

ATTENTION: *Do not forget that this note is altered a semitone higher than what is normally found in the major scale.*

Let's observe the following excerpts:



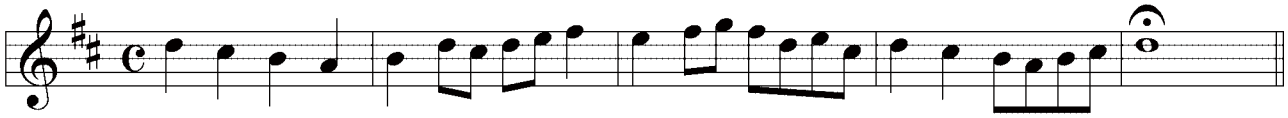
The first melody has no accidentals except those which belong to the diatonic major scale of G. It also ends on the tonic.



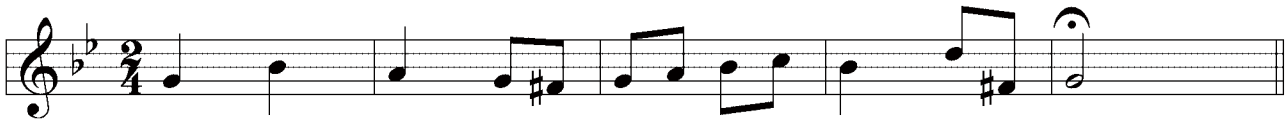
In the second melody, not only do we find the key signature of one sharp, but we find a D# which is the leading note of E minor. This melody also ends on the tonic.

A) State the key of each melody:

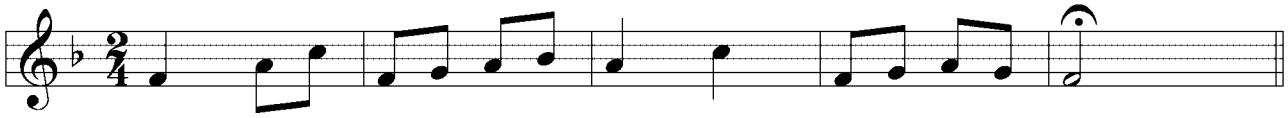
1)



2)



3)



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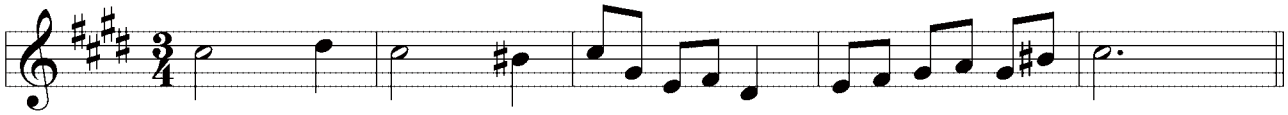


Understanding all the Regular Time Signatures

1. The following chart compares simple and compound time signature.

	SIMPLE TIME	COMPOUND TIME
DUPLE (2 beats)	$\frac{2}{2}$ $\frac{2}{4}$ $\frac{2}{8}$	$\frac{6}{4}$ $\frac{6}{8}$ $\frac{6}{16}$
TRIPLE (3 beats)	$\frac{3}{2}$ $\frac{3}{4}$ $\frac{3}{8}$	$\frac{9}{4}$ $\frac{9}{8}$ $\frac{9}{16}$
QUADRUPLE (4 beats)	$\frac{4}{2}$ $\frac{4}{4}$ $\frac{4}{8}$	$\frac{12}{4}$ $\frac{12}{8}$ $\frac{12}{16}$

2. It is very important to understand that in simple measures, the beats are divisible by two, and in compound time, the beats are divisible by three.

3. Observe attentively the time signatures that are less common, for you will surely find them in your musical pieces.

Note: *As in simple time, notes and rests in compound time are grouped so as to make the divisions of the beats as clear as possible. All the notes belonging to one beat are grouped together.*

Compound Time Signatures

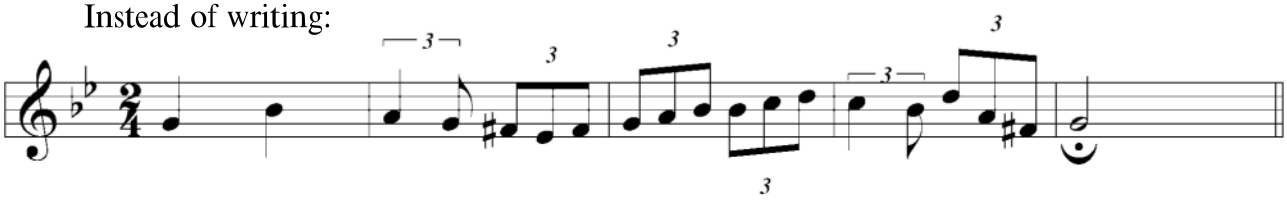
There are two categories of time signatures – SIMPLE and COMPOUND. Compound time is divided into the same three groups as simple time, called COMPOUND DOUBLE (meaning two), COMPOUND TRIPLE (meaning three), and COMPOUND QUADRUPLE (meaning four).

4. In compound time, notes are grouped in a three beat pattern called pulses.

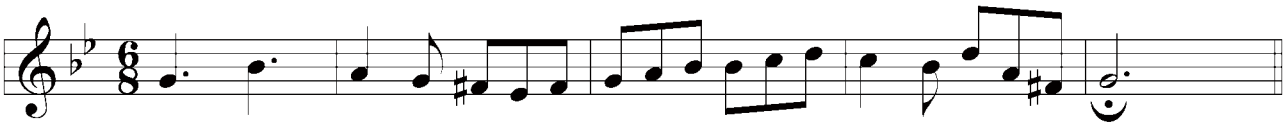
Note: *While the term pulse is normally used to refer to a beat, for the purpose of explaining compound time clearly, the word "pulse" here refers to a DIVISION of the beat and not the beat itself. (For example in 6/8 time, each eighth note is a pulse).*

5. In 2/4 time, there are two beats or pulses in a bar, and in 6/8 time, there are six beats or pulses (that is, two groups of three beats) in a bar. As in simple time, notes and rests in compound time are grouped so as to make the divisions of the beats as clear as possible. All the notes belonging to one beat are grouped together. Notes in compound time are usually in the form of dotted notes.

Instead of writing:



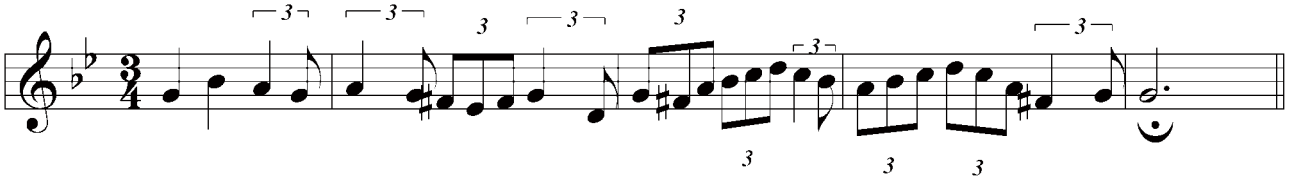
We write:



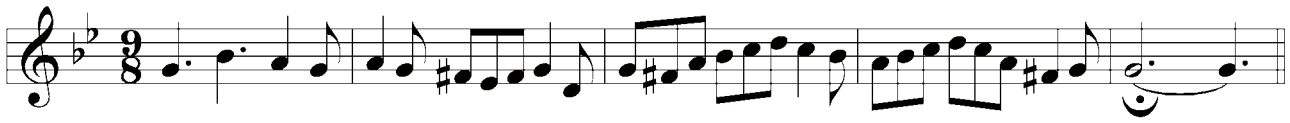
In referring to the previous examples, you can see that the complicated rhythms found in the simple time are simplified in the compound time.

6. The following are examples comparing simple to compound time:

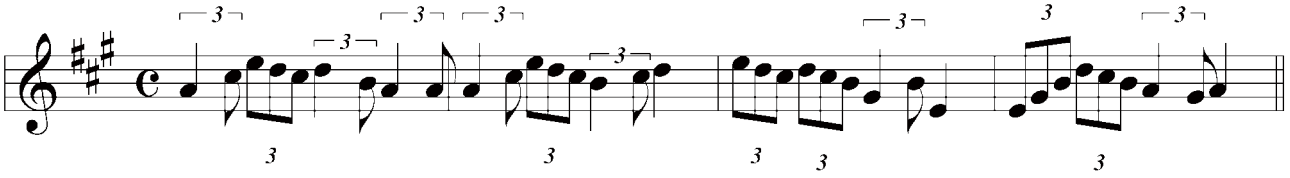
Three beat time



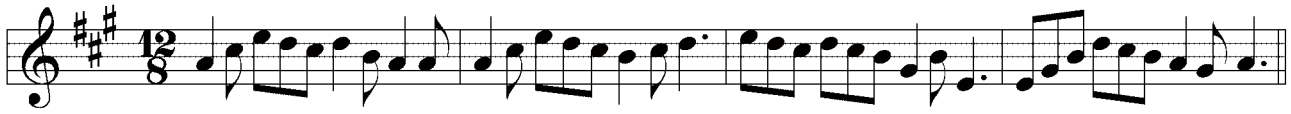
Replaced by:



Four beat time



Replaced by:

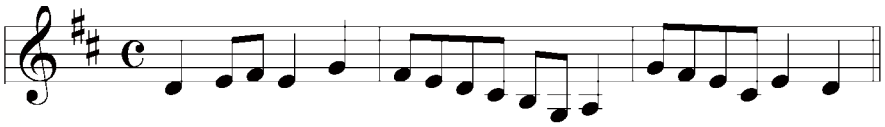


17. Transposition generally means a change of key. It is often used in songs to accommodate the range of a singers's voice or an instruments's range. The word can also mean a change of clef without necessarily meaning a change of key.

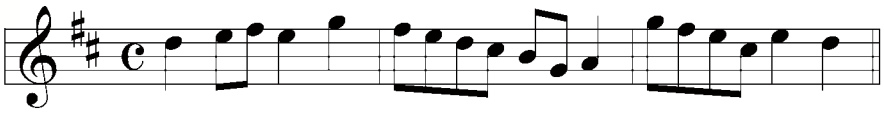
18. At this stage, you will only transpose melodies an octave higher or an octave lower.

19. To transpose an octave higher, you must rewrite the melody where each note is raised by and octave – eighth notes.

Original Melody



Transposed an octave higher



20. When transposing up or down, the following steps should be followed:

1) The clef, key signature, and time signature must always be written correctly.

2) The stems of the notes must be placed in the proper direction.

Note: *The names of the notes must remain identical in the transposition.*

3) The notes of the melody must always be exactly an octave apart.

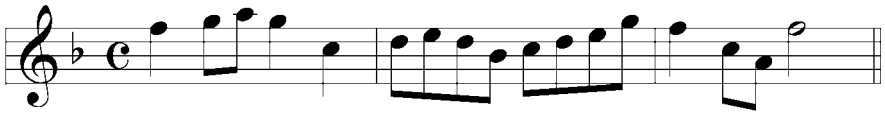
4) All accidentals and alterations must be written in.

5) The melody remains in the same key.

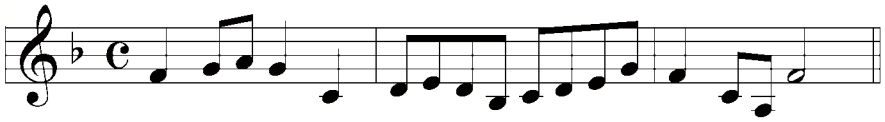
21. When transposing an octave lower the same procedure follows but each note is lowered by an octave.

e.g.

Original melody

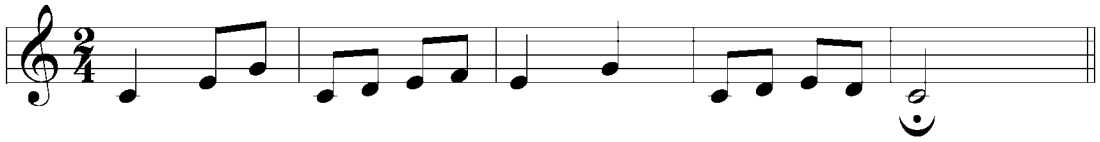


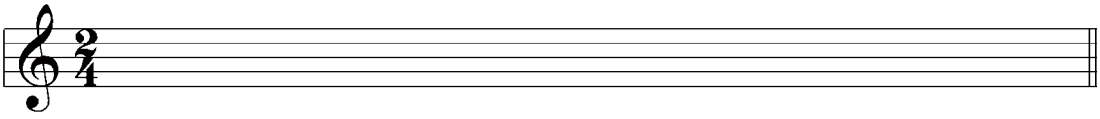
Transposed an octave lower



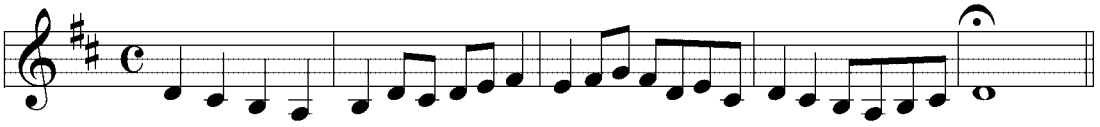
A) Transpose the following two melodies an octave higher.

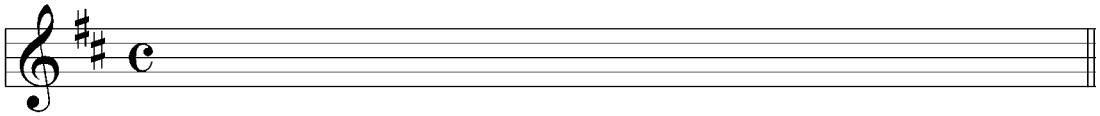
1)



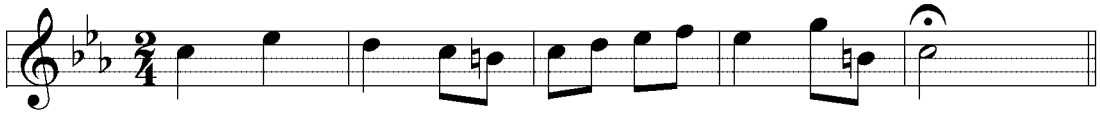


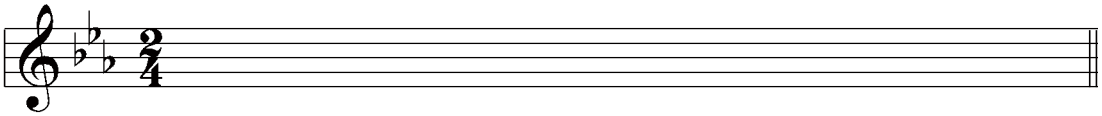
2)





B) Transpose the following melody an octave lower.





21. Throughout your musical training, you will have to recognize and understand new Italian words that you will frequently find in musical pieces. These terms are the composer's way of expressing the interpretation of the musical piece. Certain words correspond to tempo, variation of tempo, and style, et

22. The following are words that you might find in a musical piece at your level.

Variation in Tempo

Italian	English
piu mosso	more movement, quicker
meno mosso	less movement, slower

Style

Italian	English
animato	animated
con moto	with motion
espressivo	expressively
leggiero	light and graceful
maestoso	majestically, dignified
tranquillo	tranquil

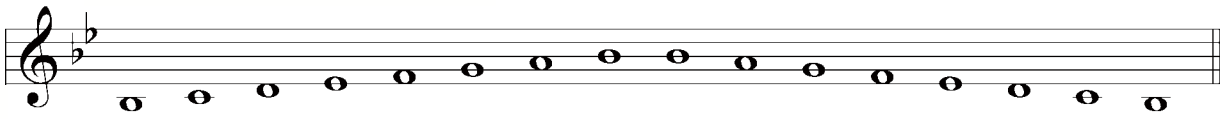
Adverbs used in conjunction with other words

Italian	English
non troppo	not too much
troppo	too much
molto	very much
simile	the same

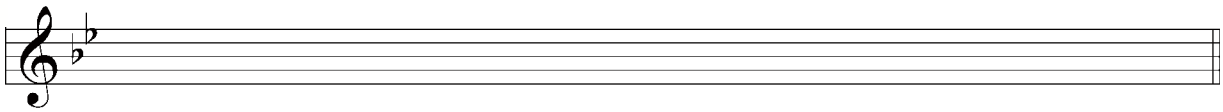
REVIEW EXAM

Construct a melodic minor scale from its relative major (ascending and descending)

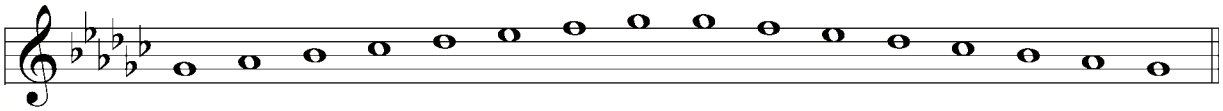
B♭ major



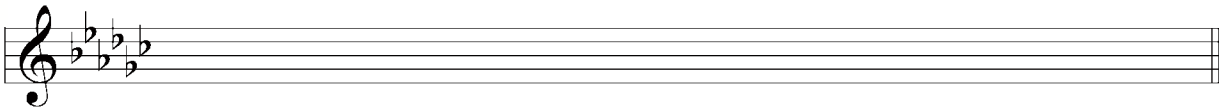
_____ harmonic minor



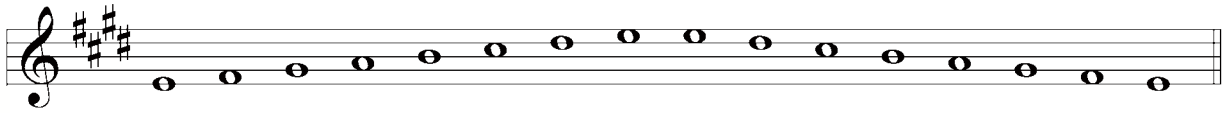
G♭ major



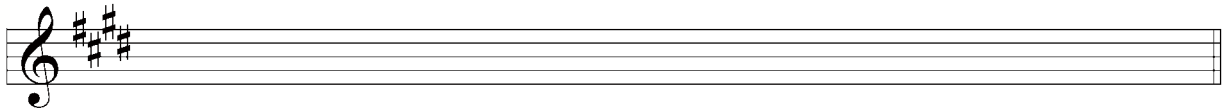
_____ melodic minor



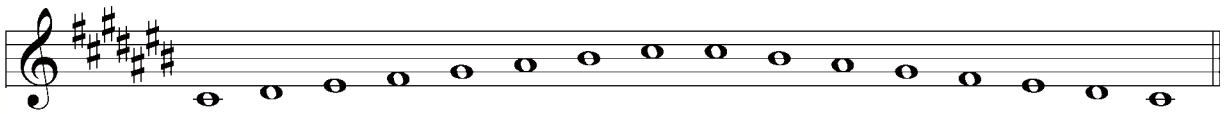
E major



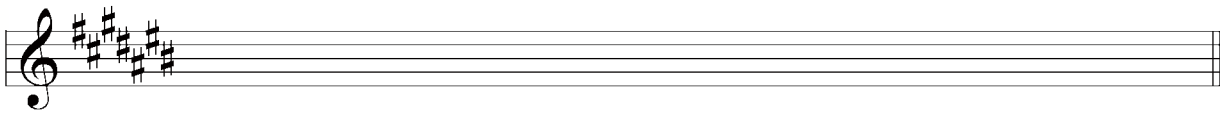
_____ melodic minor



C♯ major

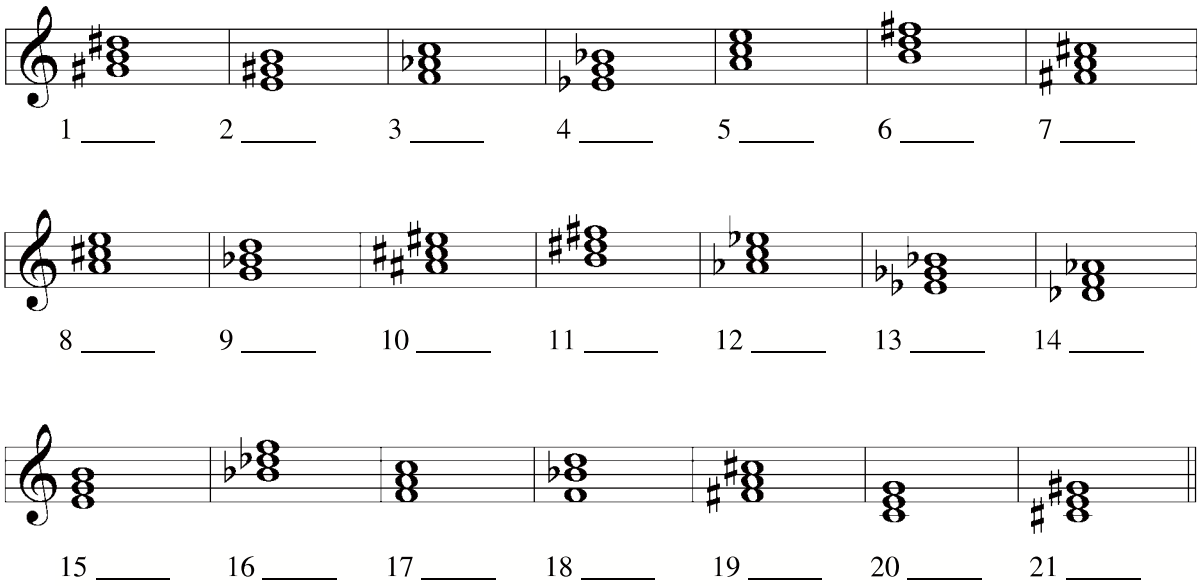


_____ melodic minor



REVIEW EXAM

Name and identify the following chords:

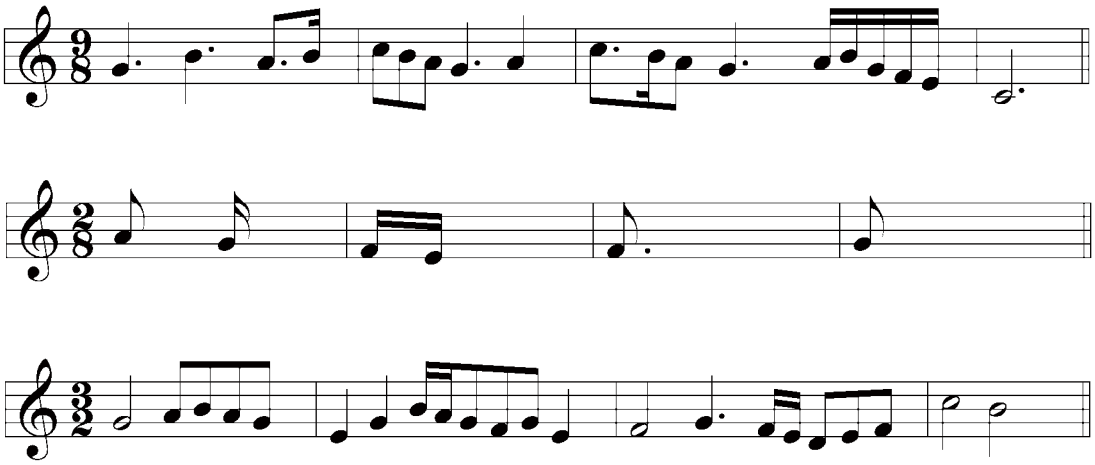


Match the word with its definition:

Animato	expressively
Simile	not too much
Maestoso	with spirit
Non troppo	same
Tranquillo	less movement
Piu mosso	very much
Meno mosso	more movement
Molto	with motion
Con moto	tranquil
Espressivo	too much
Leggiero	light and graceful
Troppo	majestically

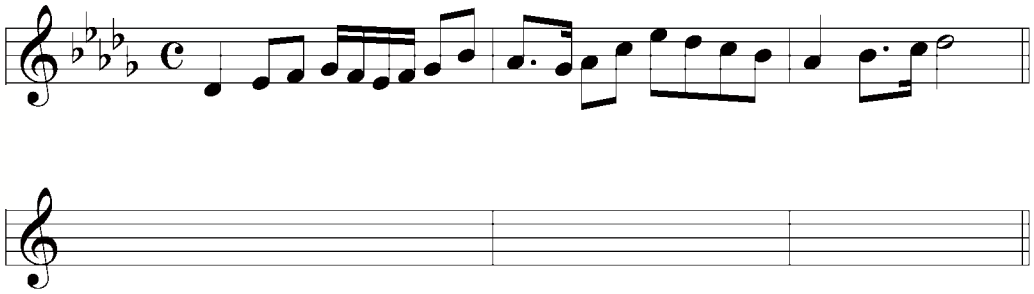
REVIEW EXAM

Complete the following measures by using one note or rest.

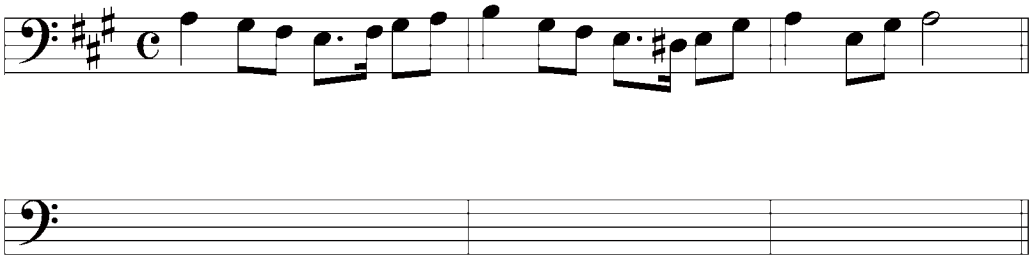


REVIEW EXAM

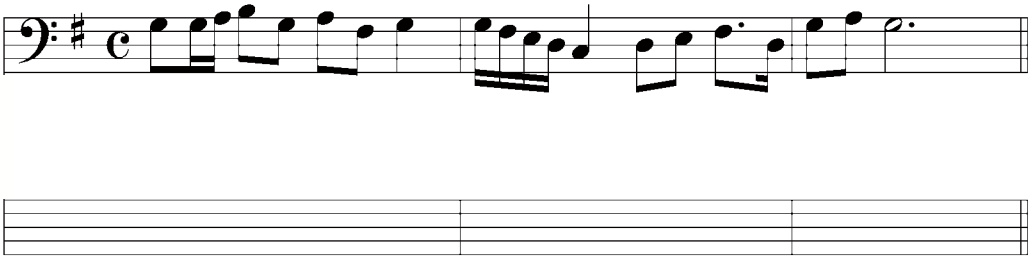
Transpose this melody one octave higher



Transpose this melody one octave lower

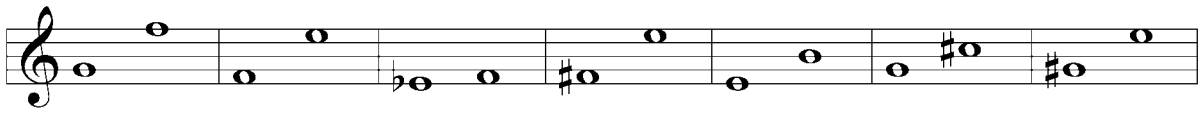


Transpose this melody an octave higher. Use the appropriate clef.

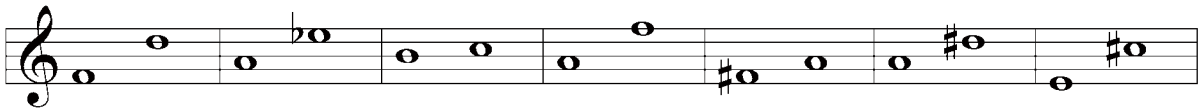


REVIEW EXAM

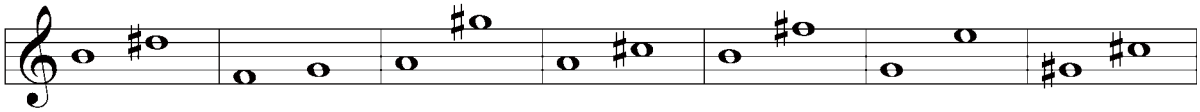
Name the following intervals:



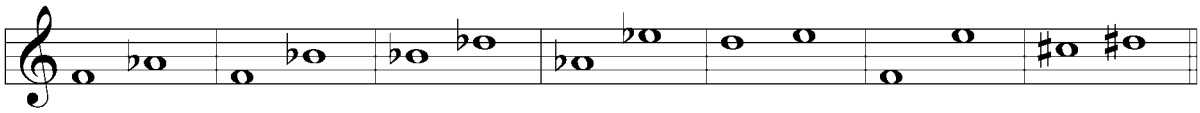
1 _____ 2 _____ 3 _____ 4 _____ 5 _____ 6 _____ 7 _____



8 _____ 9 _____ 10 _____ 11 _____ 12 _____ 13 _____ 14 _____

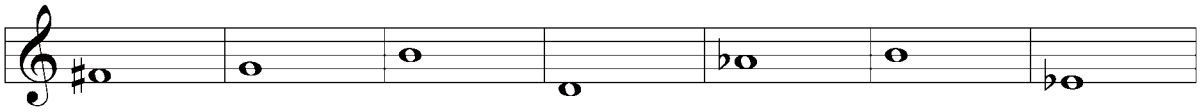


15 _____ 16 _____ 17 _____ 18 _____ 19 _____ 20 _____ 21 _____

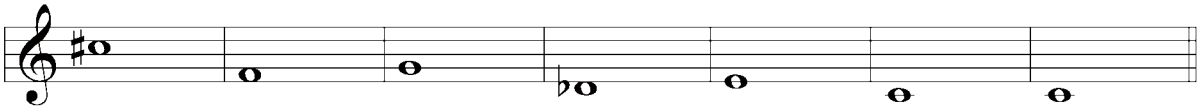


22 _____ 23 _____ 24 _____ 25 _____ 26 _____ 27 _____ 28 _____

Find the upper note needed to create the following intervals:



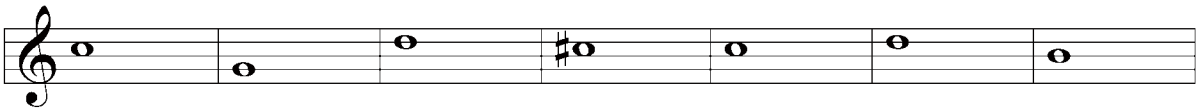
Perfect 5th Minor 6th Major 3rd Major 7th Minor 2nd Perfect 4th Minor 7th



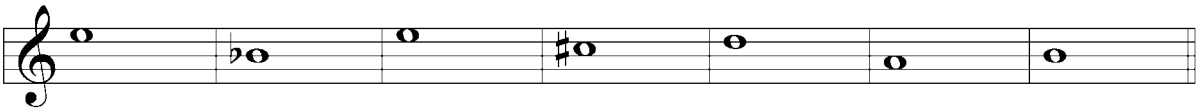
Major 2nd Major 6th Aug. 4th Minor 3rd Dim. 5th Minor 7th Minor 6th

REVIEW EXAM

Find the lower note needed to create the following intervals:



Minor 6th Minor 2nd Perfect 5th Minor 7th Perfect 4th Minor 3rd Dim. 5th



Major 7th Major 3rd Minor 6th Major 2nd Minor 7th Aug. 4th Major 6th