

Theory Notes (page 1/3)

These are some notes that should help jog your memory of each topic we discussed. These are not lessons in of themselves, more so just a brief overview of the topic.

Building a Scale: Start at any note and build the Major Scale by: W – W – H – W – W – W – H

Building a Triad (Chord): Start at any Scale (Key) and build:

Major: 1 – 3 – 5

Minor: 1 – b3 – 5

Diminished: 1 – b3 – b5

Building a Triad in a Key: Go to that Key, start 1 – 3 – 5 and find the notes that make up the chord you're looking for. Check the chord's key to determine what type of chord it is.

Example: D chord in the key of C

- Go to key of C and build 1 – 3 – 5 starting from D note. You will get: D – F – A
- Go to key of D and build 1 – 3 – 5 starting from the D note. You will get: D – F# – A
- Since the 3 is down a half step in the key of C we know our D chord in the key of C is Dm.

Chords As Numbers: Since every chord is built using the same formula, if we build a chord starting from the 1st note, 4th note or 5th note of the scale it will always be Major. If we build a chord starting from 2nd note, 3rd note or 6th note of the scale it will always be Minor.

1 – 4 – 5 = Major Chords in a Key

2 – 3 – 6 = Minor Chords in a Key

Chords As Numbers - Transposing: We transpose to another key by finding the chord numbers of a chord progression in one key and move that to another key where we find the same chord numbers.

Example: C – G – Am – F to the key of G

- C – G – Am – F is a I – V – vi – IV (1 5 6m 4) in the key of C
- I – V – vi – IV in the key of G is: G – D – Em – C

Chords As Numbers – NonDiatonic: If a chord progression is almost all in a key except for one chord, then we just notate the difference of that chord. Since our 1 – 4 – 5 chords are typically major in a key, we have to notate it if they are minor, or if a root note is a half step above or below. Same principle for the 2 – 3 – 6 chords – if they are major or if the root note is a half step above or below, we have to notate that.

Example 1: C – D – F – G

*Most of the chords (C – F – G) are in the key of C. The D chord is typically a minor chord in the key of C, therefore we have to notate the 2 chord in this case is major (II).

Example 2: C – Dm – Ab – G

*Most of the chords (C – Dm – G) are in the key of C. The A chord is typically a minor, so we have to notate this is a b6 chord that's a major (bVI).

Theory Notes (pg. 2/3)

Chords As Numbers – Modulating: The dominant 7 chord only happens once per key so once we see a Dominant 7 we have a big clue what root note it's going to next (the root note could be a major or a minor).

Example: C – C7 – F – G7

The C7 only happens once – in the key of F – so we are temporarily going to the key of F. Until we see the G7 which is bringing us back to C (since we only find a G7 in the key of C)

Building 7th Chords: We build it just like the original triads (major/minor/diminished chords) except we skip one more note and go to the 7th. There are a few different types of 7th chords.

Major 7: 1 – 3 – 5 – 7 (written as maj7 | Ex: Cmaj7 | C – E – G – B)

Dominant 7: 1 – 3 – 5 – b7 (written with just a 7 | Ex: C7 | C – E – G – Bb)

Minor 7: 1 – b3 – 5 – b7 (written as m7) | Ex: Cm7 | C – Eb – G – Bb)

m7b5: 1 – b3 – b5 – b7 (written as m7b5 | Ex: Cm7b5 | C – Eb – Gb – Bb)

Fully Diminished: 1 – b3 – b5 – bb7

(written as dim or with a little circle above it | Ex: Cdim | C – Eb – Gb – Bbb)

Naming Chords: When we see an extension (like 9, 11 or 13) we just keep skipping notes to get to the extension we see at the end of the chord. (9 is the same note as 2, just up an octave. 11 is the same note as 4. 13 is the same note as 6).

Major 13: 1 – 3 – 5 – 7 – 9 – 11 – 13 (Cmaj13: C – E – G – B – D – F – A)

Dominant 13: 1 – 3 – 5 – b7 – 9 – 11 – 13 (C13: C – E – G – Bb – D – F – A)

Minor 13: 1 – b3 – 5 – b7 – 9 – 11 – 13 (Cm13: C – Eb – G – Bb – D – F – A)

*Add means we skip the 7 and just add the extension

(Ex: add 9 = 1 – 3 – 5 – 9 | Cadd9 = C – E – G – D)

*Sus means we “suspend” the 3 for either the 2 or 4

(Ex: sus2 = 1 – 2 – 5 | Csus2 = C – D – G)

* Key is look for what numbers we see. Do we see a 3? No? most likely a sus. Do we see a 7? That tells us if it's an add vs. an extended chord (9, 11, 13). Most important notes are 3 and 7.

Finding a Key: Most of the songs starts out with the I (1) chord. If we want to make sure it starts out on the one look at the theory sheet and go to the key of the first chord. That chord will only be found one key above it and one key below it. Check the chords and determine what key has all the chords in the progression. If all but one of the chords are in the key we may be looking at a “Chords As Numbers – NonDiatonic” example, which is explained above.

Example: A – Em – D – Bm

I go to the key of A, the chord of A will only be found in the keys of A, D and E. Em is not in the key of E or A, so the only key that has all these chords is the key of D.

**Modes can also be an explanation of this, once all these theory concepts are internalized we can discuss a more thorough way of exploring this. I think this is a great way to think about it until modes can be adequately explained.*

Theory Notes (pg. 3/3)

Relative Major/Minor: The one chord is the Major root, the vi chord (6m) chord is the minor key root. So therefore the key of C Major and A Minor share the same notes in their scale. We can find this easily by remembering:

- 1st finger (index) on the Minor root
- A finger to a fret
- 4th finger (pinky) on the Major root

It works both ways. If you know your minor scales better than your major scales and the chord progression is in a major key: C – G – Am – F, then put your pinky on the C and where your index finger lies will be where your Am scale shapes will fall.

The same thing in reverse. If you know your major scales better than your minor scales and you're playing a minor progression: Am – F – C – G than put your index finger on the minor root and where your pinky lies will be where your C major scale shapes will fall.