

Chord Progressions

A chord progression (or harmonic progression) is a series of musical chords, or chord changes that "aims for a definite goal" of establishing (or contradicting) a tonality founded on a key, root or tonic chord. Chords and chord theory are generally known as harmony.

A chord progression can be thought of as a harmonic simultaneity succession: it offers an ongoing shift of level that is essential to Western Music. A change of chord generally occurs on an accented beat, so that chord progressions may contribute significantly to the rhythm, meter and musical form of a piece, delineating bars, phrases and sections.

A chord may be built upon any note of a musical scale, therefore a seven-note scale allows seven basic chords, each degree of the scale becoming the "root" or "tonic" of its own chord. A chord built upon the note A is an A chord: however, since any progression may be played in any key, the fundamentals of harmony are best grasped by numbering the chords according to the step of the scale they are built upon, upwards from the key-note. The structural meaning of a harmony depends exclusively upon the degree of the scale.

Any major scale gives three major triads that together include, and so can harmonise, every note of that scale. They are based on the first, fourth, and fifth scale degrees (the tonic, subdominant and dominant).

The same scale also provides three relative minor chords, one related to each of the three major chords. These are based upon the sixth, second and third degrees and stand in the same relationship to one another as do the three majors. Apart from these six common chords there will be one step of the scale that gives a diminished chord.

In addition, extra notes may be added to any chord. If these notes are also selected from the original scale the harmony remains diatonic. If new chromatic intervals are introduced then a change of scale or modulation occurs, which may bring the sense of a change of tonal centre. This in turn may lead to a resolution back to the original key, so that the entire sequence of chords helps create an extended musical form.

Although all this allows for a large number of possible progressions (depending upon the length of the progression), in practice progressions are often limited to a few bars' length. Certain progressions are favored above others which can sometimes define an entire genre of music.

In western classical notation, chords built on the scale are numbered with Roman numerals. A D chord will be figured I in the key of D, for example, but IV in the key of A. Minor chords are signified by lower case Roman, so that D minor in the key of C would be written ii. Other forms of chord notation have been devised, from figured bass to the chord chart. These usually allow or even require a certain amount of improvisation.

Simple Progressions

Diatonic scales such as the major and minor scales lend themselves particularly well to the construction of common chords because they contain a large number of perfect fifths.

The interchange of two chords may be thought of as the most basic chord progression and many well-known pieces are built harmonically upon the mere repetition of two chords of the same scale. Velvet Underground's "Heroin" is built upon a repeated I - IV. Bob Marley's "Buffalo Soldier" uses I - vi.

Three-Chord Progressions

Three-chord tunes are more common, since a melody may then dwell on any note of the scale. Often the chords may be selected to fit a pre-conceived melody, but just as often it is the progression itself that gives rise to the melody.

The three-chord I - IV - V progression, a particularly popular kind of circle progression, can be placed into a four-bar phrase in several ways that have been put to endless use in popular music.

- I - IV - V - V. (The Beatles's "Lucy in the Sky with Diamonds")
- I - I - IV - V. (The Rolling Stones' "Get Off Of My Cloud")
- I - IV - I - V. (Solomon Linda's "Mbube"/"Wimoweh"/"The Lion Sleeps Tonight")
- I - IV - V - IV. (Chip Taylor/The Troggs' "Wild Thing")

This basic harmonic pattern occurs in many other pop songs—the output of Phil Spector might also be cited. Similar progressions abound in African popular music. They may be varied by the addition of sevenths (or other scale degrees) to any chord or by substitution of the relative minor of the IV chord to give, for example, I - ii - V. This last is heard, for example, in The Beach Boys' "Good Vibrations" ("Got to keep those...."). This sequence, using the chord based on the second scale degree, is also used cadentially in a common chord progression of jazz harmony, the so-called ii-V-I turnaround, on which are based the more ornate Coltrane changes.

Such progressions provide the entire harmonic foundation of much African and American popular music, and they occur sectionally in many pieces of classical music (such as the opening bars of Beethoven's Pastoral Symphony).

Any of these progressions may be transposed into any key so that, for instance, the progression I - IV - V in the key of A will be played A - D - E, while in the key of C the chords will be C - F - G.

While this does not represent the entire harmonic structure of a piece, it may readily be extended for greater variety. Frequently an opening phrase of the type I - IV - V - V, which ends on an unresolved dominant, may be "answered" by a similar version that resolves back onto the home chord, giving a structure of double the length:

- I - IV - V - V
- I - IV - V - I

Additionally, such a passage may be alternated with a different progression to give a simpler form.

The Use of Chord Progressions

Expanding What We've Learned

If you're reading sheet music, this will help you make some sense of the changes. If you are trying to figure out how to play a song, it will help you figure out the changes more quickly and correctly. If you're improvising or writing songs, this information is invaluable.

I-IV-V-I

If you play even a little folk guitar, you've probably noticed that certain sets of major chords go together:

G-C-D-G
 C-F-G-C
 D-G-A-D
 A-D-E-A
 E-A-B-E

These progressions are, in fact, all the same. Here's how:

Take G-C-D-G. If you name the first note in the scale as 1 and count up, then G=1, A=2, B=3, C=4 and D=5. If you start on C, then C=1, D=2, E=3, F=4 and G=5. Musicians use Arabic numbers to designate notes in the scale and Roman numerals to designate the chords in a key. If you do the same exercise for each of these chord progressions, you'll notice that each of them has the same pattern: I, IV, V, I. Play each one and you can hear it - The steep rise followed by the step rise, followed by a fall back to the start. Natural as gravity.

I-IV-V is the foundation of folk music. Armed only with this information, you can pretty much play any blues, rock or traditional song in any key. Also, almost anything by Woody Guthrie, including "This Land Is Your Land." Just start out on the I chord and when you hear a chord shift, nine times out of ten it's either to the IV or V chord.

Here's an example:

G	C	G
I	IV	I
This land is your land, this land is my land		
	D	G
	V	I
From California to the New York islands		
	IV	I
From the redwood forests to the gulf stream waters		
V		I
This land was made for you and me		

Seventh Chords

Without going into a lot of musical theory, when you take your V chord and turn it into a V7 chord, it pulls you back to the I chord more powerfully. That's why in the key of G, you'll see a lot of D7 chords just before ending up on G - especially at the end of a phrase. In the key of C, you see G7 a lot.

G	C	G
I	IV	I
This land is your land, this land is my land		
	D7	G
	V7	I
From California to the New York islands		
	IV	I
From the redwood forests to the gulf stream waters		
V7		I
This land was made for you and me		

Relative Minor Chords

What about the minor chords? Again, think of the chords that always seem to go together:

With G-C-D you usually find Em, Am and - a little less often - Bm. Hardly ever Dm or Fm for instance.

With C-F-G you often find Am, Dm and sometimes Em - but rarely Bm

Why?

If you move 3 half steps down from the root note of any major chord you arrive at what's known as its "relative minor."

The relative minor scale uses the same notes as the major scale, just starting in a different place. To see this on a piano, play a C scale (all the white notes) - This is a major scale. Now play all the white notes starting on A instead of C and voila - you get the minor scale. (oh and by the way, start on D and you get the Dorian scale....).

How does this happen? The different scales occur because in the 8-note octave scale some intervals between notes are a whole step and some are 1/2 step. In a major scale, there are half steps between notes 3-4 and 7-8; the rest are whole steps. You can see this quite clearly on the piano: starting on C, there are no black keys between E and F or between B and C - they are 1/2 step apart. In a minor scale - the white keys starting on A - the half steps come between notes 2-3 and 5-6.

If you stay on the white keys and play an octave starting on each of the different notes of the scale, you get a different pattern of whole steps and half steps. Each pattern of whole and half steps has its own feel. These are the classical modes. The major scale - ionian mode - is happy, declarative; the minor scale - aeolian mode - is sad or melancholy.

So, if you count down 3 half steps from C (B, Bb, A) you see that the relative minor of C is Am. The relative minor for G is Em and the relative minor for D is Bm. Now, it's very common that in a chord progression you can SUBSTITUTE a major chord with its relative minor (minor chords are usually written with small roman numerals). So, reading down the columns you can see the major chords in each key and which minor chords they're related to:

General	Key of C	Key of G	Key of D	Key of E
I becomes vi IV becomes ii V becomes iii	C -> Am F -> Dm G -> Em	G -> Em C -> Am D -> Bm	D -> Bm G -> Em A -> F#m	E -> C#m A -> F#m B -> G#m

In turn, this is what you would get:

G - C - G

I IV I

This land is your land, this land is my land

D - G

V I

From California to the New York islands

C G - Em

IV I - vi

From the redwood forests to the gulf stream waters

V I

This land was made for you and me

"Blowin In The Wind"

C - D - G - Em

IV V I vi

The answer my friend, is blowin' in the wind

IV V I

The answer is blowin' in the wind

Notice how in these examples, the major chord is played and then turns or resolves into the relative minor chord. You use both. In the first line of "Puff the Magic Dragon," the B minor chord substitutes for the D completely:

"Puff The Magic Dragon"

G Bm C G

I iii IV I

Puff the magic dragon lived by the sea...

Often you have both movement from major to relative minor as well as complete substitutions going on in a progression. You can hear this in the classic 50s riff, which you can now see is just a variation on the basic I-IV-V:

G	Em	Am	D
I	vi	ii	V

Minor Keys

If you completely substitute the minor chords for the major ones, you wind up in the minor key. Then, of course, you can start substituting major chords for minor ones....

So, even though you may be dealing with seemingly complicated combinations of 6 chords - plus 7ths, suspended chords, and occasional color chords, etc. - in folk and folk-rock, it usually all boils down to the simple I-IV-V progression.

In songs that have verses and choruses you'll notice that if the song begins on the I (almost always), the chorus will often jump up and start on the IV or V chord - or shift to one of the minor chords in the key. A song in a minor key may shift to the major for a chorus. Bridges are not common in folk songs - they are more in the pop idiom. They often shift tonalities more drastically.