## Chord Substitution - Part 5

Ted Greene - 1973, November 20
Compare the following:

1) $\begin{array}{lllllllll}\text { Key of } \mathrm{A} \rightarrow & \mathrm{F} \# \mathrm{~m} 7 & \mathrm{Bm} 7 & \mathrm{E} 7 & \mathrm{~A}^{\Delta 7} & \mathrm{D}^{\Delta 7} & \mathrm{G}^{\varnothing} 7 & \mathrm{CH7} & \mathrm{~F} \# \mathrm{~m} 7 \\ & \text { vi } & \text { ii } & \text { V } & \text { I } & \text { IV } & \text { vii }^{\circ} & \text { III } & \text { vi }\end{array}$
2) Key of $\mathrm{F} \# \mathrm{~m} \rightarrow \quad \mathrm{~F} \# \mathrm{~m} 7 \quad \mathrm{Bm} 7 \quad \mathrm{E} 7 \quad \mathrm{~A}^{\Delta 7} \quad \mathrm{D}^{\Delta 7} \quad \mathrm{G} \#^{\varnothing} 7 \quad \mathrm{C} \# 7 \mathrm{~F} \# \mathrm{~m} 7$

I iv bVII bIII bVI $\mathrm{ii}^{\circ}$ V i
What is different about these two progressions? Only the Roman numerals underneath, or in other words, only the way you choose to think of the chords in relation to each other. When you encounter a minor cycle of 4ths, you should ask yourself which of the two sets of Roman numerals would help you to understand and get the most out of it; often the relative major viewpoint is easier.

Another thought: all previous and forthcoming substitution principles will not be appropriate everywhere - you must experiment.

Another neglected point which may have already occurred to you - any 7th chord dealt with may be replaced with its related triad, like $\mathrm{C} \#$ for $\mathrm{C} \# 7, \mathrm{G} \#^{\circ}$ for $\mathrm{G} \#^{\varnothing} 7$, B for B 7 , etc.

Here are some common cycle patterns in the key of A $\rightarrow$
Practice them "straight" first, that is as indicated, then substitute extended chords (or triads).
Transpose to all major and minor keys (they are given in A and F\#m).
Know your names and numbers (Roman numerals) in all keys.
Use lots of different inversion on each one.
Remember, ${ }^{\varnothing} 7=\mathrm{m} 765$; different people use one or the other. You will encounter both.
Plan on at least a month on this set of exercises.

1) $\quad \mathrm{Bm} 7 \quad \mathrm{E} 7 \mathrm{~A}$
2) $\mathrm{B} 7 \mathrm{E} 7 \quad \mathrm{~A}$
3) $\quad \mathrm{Bm} 765 \mathrm{E} 7 \mathrm{~A}$
4) (A) $\mathrm{F} \# \mathrm{~m} 7 \mathrm{Bm} 7 \mathrm{E} 7 \mathrm{~A}$
5) $\quad \mathrm{F} \# \mathrm{~m} 7 \mathrm{~B} 7 \quad \mathrm{Bm} 7 \mathrm{E} 7 \mathrm{~A}$
6) $\quad \mathrm{C} \# \mathrm{~m} 7 \quad \mathrm{~F} \# \mathrm{~m} 7 \quad \mathrm{Bm} 7 \mathrm{E} 7 \mathrm{~A}$
7) $\quad \mathrm{C} \# \mathrm{~m} 7 \mathrm{~F} \# 7 \mathrm{Bm} 7 \mathrm{E} 7 \mathrm{~A}$
8) $\quad \mathrm{C} \# \mathrm{~m} 7 \mathrm{~b} 5 \mathrm{~F} \# 7 \mathrm{Bm} 765 \mathrm{E} 7 \mathrm{~A}$
9) $\mathrm{C} \# 7 \mathrm{~F} \# 7 \mathrm{~B} 7 \mathrm{E} 7 \mathrm{~A}$
10) $\mathrm{G} \# \mathrm{~m} 7 \mathrm{C} \# 7 \mathrm{~F} \# \mathrm{~m}$
11) $\mathrm{G} \# 7 \mathrm{C} \# 7 \mathrm{~F} \# \mathrm{~m}$
12) $\mathrm{G} \# \mathrm{~m} 7 \mathrm{~b} 7 \mathrm{C} \# 7 \mathrm{~F} \# \mathrm{~m}$
13) $(\mathrm{F} \# \mathrm{~m}) \mathrm{D}^{\Delta 7} \mathrm{G} \# \mathrm{~m} 7 \mathrm{~b} 5 \mathrm{C} \# 7 \mathrm{~F} \# \mathrm{~m}$

4a) D\#m765 G\#7 C\#7 F\#m
5) $\quad \mathrm{D} \# \mathrm{~m} 7 \mathrm{~b} 5 \mathrm{G} \# 7 \mathrm{G} \#^{\varnothing} 7 \mathrm{C} \# 7 \mathrm{~F} \# \mathrm{~m}$
6) $\quad \mathrm{A}^{\Delta 7} \quad \mathrm{D}^{\Delta 7} \quad \mathrm{G} \#^{\varnothing} 7 \mathrm{C} \# 7 \quad \mathrm{~F} \# \mathrm{~m}$
7) $\quad \mathrm{A} 7 \quad \mathrm{D}^{\Delta 7} \quad \mathrm{G} \#^{\varnothing} 7 \quad \mathrm{CH} 7 \mathrm{~F} \# \mathrm{~m}$
8) $\mathrm{A} 7 \mathrm{D} \mathrm{D}^{4} \mathrm{G} \# 7 \mathrm{C} \# 7 \mathrm{~F} \# \mathrm{~m}$
9) Am7 D7 G\#m7 C\#7 F\#m

$[\mathrm{Key}$ of $\mathrm{F} \# \mathrm{~m}]$ 10) $\mathrm{Em} 7 \mathrm{~A} 7 \mathrm{Am} 7 \mathrm{D} 7 \mathrm{D} \#^{\varnothing} 7$ G\#7 $\mathrm{G} \#^{\varnothing} 7 \mathrm{C} \# 7 \mathrm{~F} \# \mathrm{~m}$

## Summary:

In any chord progression, you may, if time and taste allow, "squeeze in" chords that create a "circle of 4ths" effect. The most common progressions of this nature are all variations of the ii-V-I or ii-V-i (in case you didn't notice it, everything could be further reduced down to V-I(i) - that is, ii is the v of V , vi is the v of ii, and so on, thus the cycle of 5ths name as well as the cycle of 4ths).

All of this information on back-cycling and the cycle must be committed to memory as soon as possible, so plan on re-reading this stuff quite a few times, but as said before, learning songs that contain these types of patterns will speed things up (and give you something to show for your work).

Another way of thinking of ii-V progressions is to simply remember that on any dominant 7th type chord, you may count up a 5 th and play a $m 7$ type chord before the dominant 7th type. This $m 7$ type usually takes some of the time value away from the dominant 7th type.

Example:
Given
you could play

## E

1111

$$
\begin{aligned}
& \text { A } \\
& \text { / / / }
\end{aligned}
$$

$$
\begin{array}{ll}
\mathrm{Bm} 7 / 11 & \text { E7\#9 } \\
/ / / & / /
\end{array}
$$

$$
\begin{aligned}
& \mathrm{A}^{\Delta 7} \\
& \text { / / / / }
\end{aligned}
$$

Actually, in the above patterns, number 10) in the key of A is this type of device being applied to number 9). So in a way, numbers 5), 7), 8) and 10) are chains of ii-V's.

## Chord Substitution - Part 6

Ted Greene - 1973, November 20
Cross-Cycle
Another common device in modern progressions is that of replacing chords with others whose roots are a 65th higher.
Example: given Bm7 E7 A, you could play: Bm9 Bb13 $A^{\Delta 9}$ ( Bb 13 is a flat 5th higher than E).
Actually this device was only originally done with dominant 7th types. Observe:


1) The essence of the 7th chord is its 3rd and b7th; (notice that either the root or 5th may be left out when you are playing 3 -note chords).
2) The essence of the 7th chords whose roots are a b5th apart is (coincidentally) the same.
3) Therefore in many cases, especially when a 7th type chord is functioning as a V7, you may replace one with the other as show above.

The application of this to some common progressions could be as follows:
Given: Bm7 E7 A
substitute possibility:

Or
Key of C: given Dm7 G7 C



Given: B7 E7 A substitute:
//// //// ////


Or


Or


The most common chords to be used on the b5th device (for dominant 7ths) are 7th's, 9th's, 7/6's, 13th's, 7b5, 7+, 9b5, 9+, \#11, 13\#11, 7b9, 7\#9, + [augmented], 7\#9b5.

Notice the relationship between altered dominant 7ths (those with $\# 5,65,69, \# 9, \# 11$ ) on any degree and extensions whose roots are a b5th higher. Examples:

Compare and analyze:



Compare and analyze:


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This points up the closeness of some altered chords in the 65 relationship.

Sometimes m 7 and major types are involved in this b5th principle either as the chord that is being substituted for, or the chord that is doing the substituting.
Examples:
For Bm7 E7 A:

or


For F\#m7 B7 Bm7 E7 A:


Notice that the Cm7 F7 is a ii-V type pattern being used for F\#m7 B7, which is also a ii-V type pattern. This type of device can multiply the possibilities of cycle patterns (see next part).

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Hfereme nome common, cycle patterned, in the key of A $\rightarrow$ practice them

(1) Bm 7 E 7 A
(2) $\mathrm{B7} E 7 A$
(4) (A) F
(5) $\mathrm{FH} 7 \mathrm{B7} \mathrm{gm} 7 \mathrm{ET} A$




(2) Gam C\#7 CHM
(3) G

(Aa) DAM
(5) $A 7 D 76$




Summary:" lu any chord progression, you may, if time and taste allow,
 on $i i-T$. $j$ (i ncase you didn't mother ce, que everything coned be Gur then
 all. of this information on back -cycling and the cycle must be committed to memory as poon as posarke, so plan on se-reading the stiff, gite a tow times of pattens will speed things up (and i give that con taring to show for, your inrI progressions is t simply remember that


 number (10) " the k $k$ of $A$ is this type of device being applied to ii- I's,

CROSS-CyPL Chord Substitution-Page 6
Another common devie in modern progressione is that of seplacing chaderen $B M 7 E T A$ youconle play $B m 9 B^{6} / 3 A 9$







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