

# How to Read Ted Greene Chord Diagrams

by Paul Vachon

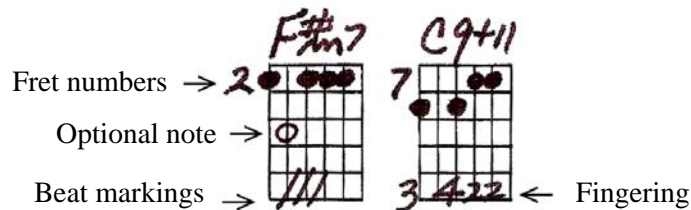
Guitarists new to Ted Greene's teaching materials often ask about his diagrams and how to read them correctly.

The first chapter of Ted's book *Modern Chord Progressions* is titled "How to Interpret the Diagrams." This is the best place to start—with Ted's own words. Also see *Chord Chemistry*, chapters 2 and 3. If you don't own a copy of these books, by all means get one!

Here we'll discuss much of that same information, presented a bit differently with some additional things that may have evolved since *Modern Chord Progressions* was written. But before we do, let's look at the basics of the diagrams.

## Basics

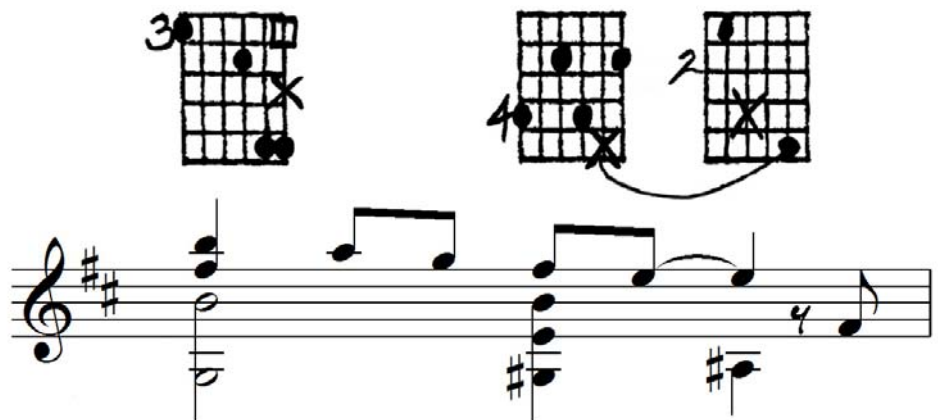
Let's start with a quick tour of some of the basic symbols Ted used in his chord diagrams:



Very often the chord names are not provided—and sometimes just the root is indicated. It would have been the student's assignment to write in the full name.

Play the solid dots first, holding them as long as possible, then the X, then the square.

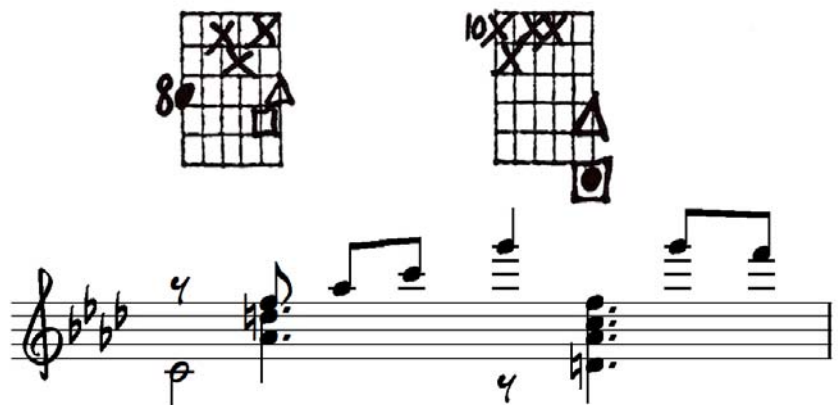
Curved lines are ties, just like in standard music notation.



[Music scores are given here to illustrate how the diagrams could be played.]

Triangles are played after squares.

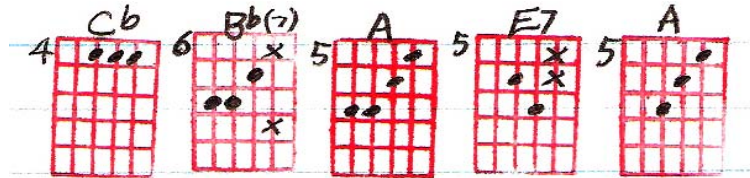
If two symbols (like a dot and a square) overlap on a grid (as in this example), you play that note twice, in order, once for each symbol. Here you play the solid dot (G) first, then again (as the square) after the X's are played.



### Beginnings

Ted developed his unique method for guitar chord diagrams over a period of many years. He created it out of a desire to illustrate chord forms with moving melody lines, something that standard chord “boxes” don’t do.

Some of Ted’s earliest chord diagrams, or “grids,” as he called them, show only the chords (marked with dots) plus an X for the moving melody line. The X was to be played after the dots, and the dots were meant to be held, or sustained, as the X note(s) sounded. But sometimes he had two X notes on the same string that were to be played after the initial dots. In the early stages Ted didn’t clarify which of the X notes was to be played first:

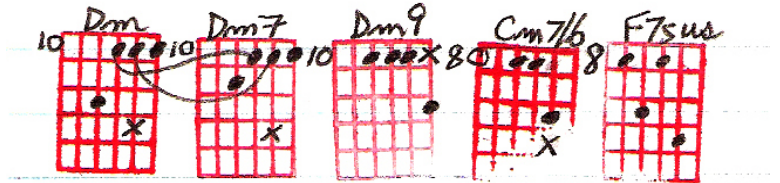


(The above is an excerpt from Ted’s 1974 write-up of *Michelle*. As you can see, at that time Ted used a chord stamper with red ink to create his grids, and he often stamped them on 8.5 x 11 writing paper—the diagrams were often crooked. Much later he started using printed “grid sheets.”)

If you knew the song, you could figure out the playing order of the X’s, but if you were unfamiliar with the melody, you’d have a difficult time deciding when to play each note.

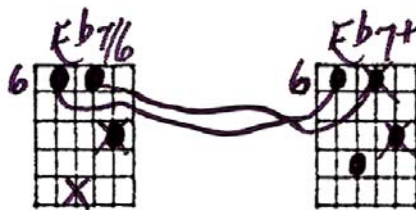
○ = OPTIONAL NOTE  
 x = MELODIC ADDITION  
 ~ = SUSTAIN (hold note)

Early on Ted used the symbols for “optional” notes (open circles) and ties (curved lines). A tie in Ted’s diagrams is the same as a tie in music notation, meaning that you hold the note over when you change to the next chord. In the example above, the F and A notes in the Dm7 should *not* be struck, but just sustained—you only play the C# and the D notes, followed by the X note (C-natural). About optional notes, Ted wrote, “If more than one optional note is given, try all possible combinations.” Open strings are indicated by a symbol above the diagram, usually with an arrow and the side comment, “open.” [See example on page 3]

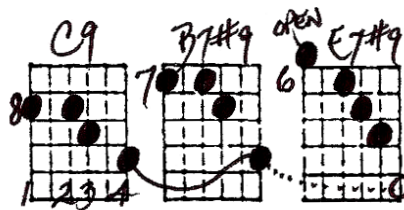


This came a bit later in the “grid evolution,” but we’ll clarify it here: if a solid dot is tied to a solid dot with an X on top of it in the next chord, then that note is played in the first chord, sustained for the next chord, and played again *after* playing the other solid dots of the second chord. See example below:

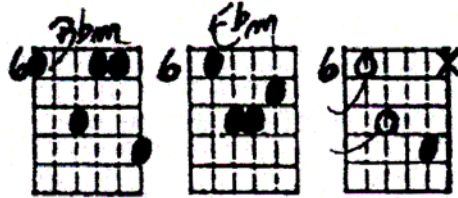
Here the tied Db is struck again on the Eb7+ chord after playing the solid dots:



An optional tie is indicated by a dotted line:



...or with a tie to a circle (optional) note.

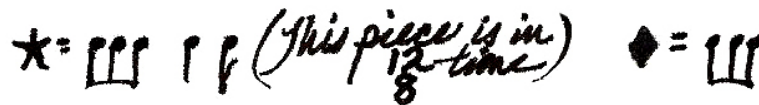


### Further Developments

When Ted realized that dots and X's wouldn't be enough for his needs of showing moving lines in chord diagrams, he added the square as the third note to be played. This group of three symbols lasted for quite a long time, until he decided to add more. The triangle was introduced next into the diagrams, to be played after a square. This playing order constitutes the most commonly used one for the bulk of Ted's arrangements and lesson sheets.

**Playing order:** ● × □ △  
○ = opt.

For a brief time a diamond shape was added to follow the square (this could have been a predecessor to the triangle). Finally a star was employed as a catch-all for anything after the triangle (or diamond), or for special instructions. Below is one occasion wherein both the star and diamond were used with special instructions, in this case, not as part of the playing order, but to indicate rhythmic values. This is found in Ted's *We're Off to See the Wizard* arrangement:

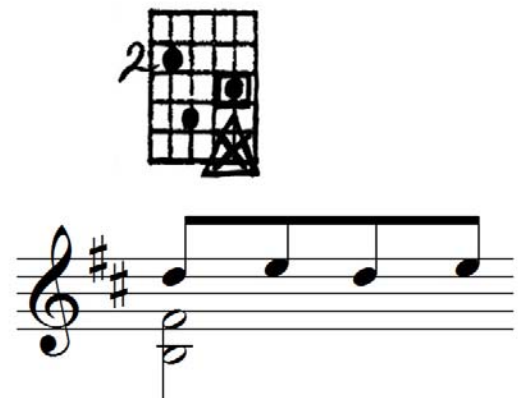


We don't find the diamond or star used too much. Occasionally we'll find diamond symbols (see Ted's *Stella by Starlight* arrangement), but I believe that Ted may have stopped using it because it too closely resembled a triangle, and with all the lines inside of those tiny grids it was too easy to confuse the two. If the diamond was filled it, it could look like a dot; if hollow, it could be confused with a triangle, or the symbol for a harmonic note. So don't worry about the diamonds—you won't see them very often.

To recap the playing order: first you play all solid dots, then if there are any X notes, play them all together. Next we play the square notes, and finally the triangles. On rare occasions a diamond or star could follow.

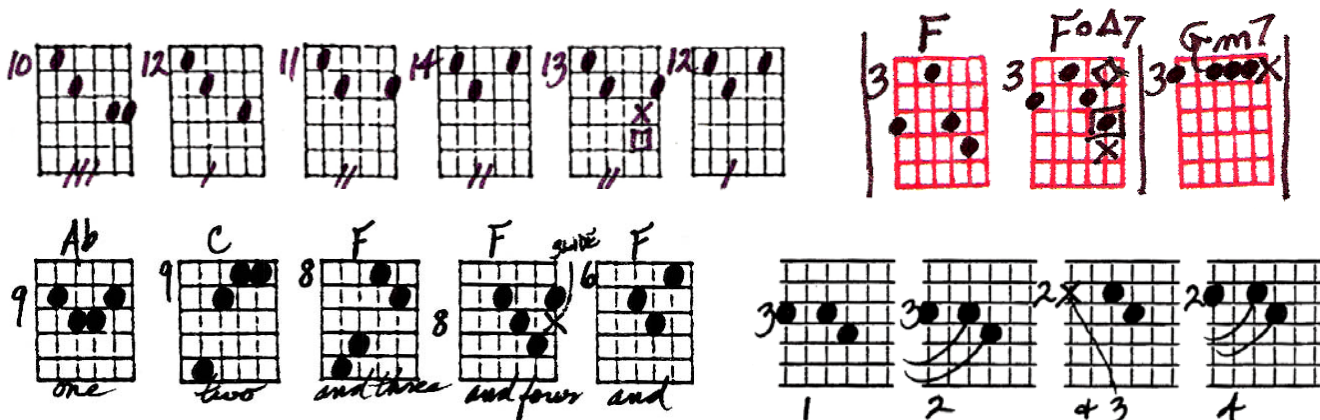
If you see any symbol with another symbol on top of it, play that note twice—the first time treat it as the first symbol, then again as the second ordered symbol. Any combination seems to be possible.

As much as possible, don't lift a finger off a note after it is played unless it's absolutely necessary—in other words, allow the notes to ring as long as possible. This is one of the main keys to playing Ted's arrangements well. His notes rang clear and long.

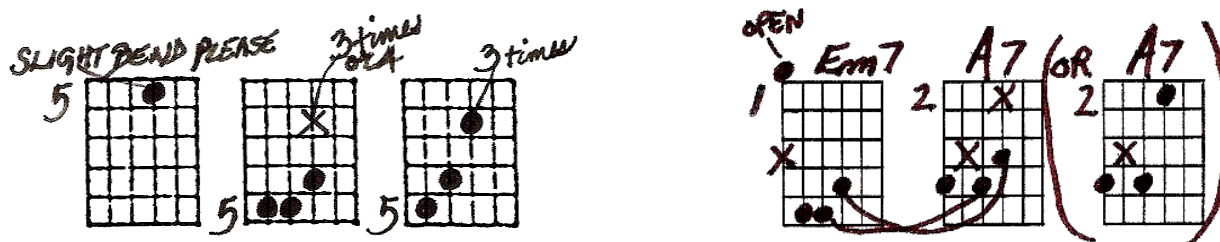


### Rhythm Marks

Sometimes Ted drew slashes ( / / / / ) below (or even directly on) the chord diagrams. These indicate beat marks—one slash equals one beat, as in standard notation for music charts. Perpendicular lines between chord grids are sometimes used to show the bars of a measure. If there are two chords in a measure of 4/4, it is assumed that each chord gets two beats. Occasionally he'd write out the counting below the grids, as in "one - and - two - and - three," etc. If he used numbers, don't confuse them with fingerings! Examples:



Ted would often draw lines to certain notes in the diagrams to give special instructions, such as: "Play 3 times" or "open" or "harmonic on 12th fret" or "optional" or "hammer-on" or "use C for #9" etc. Parentheses around a chord usually mean it is an optional variation.



Sometimes Ted would write an arrangement that was in a rough outline format—grids with few or no moving lines, and so the player was expected to fill out the rest of the song. He'd simply write: "Outline: you'll need to add some melody tones here and there." Also common were instructions to "add some right-hand rolls, delays, or arpeggios to fill it out." Very often for turnarounds, or for measures that didn't have much going on with the melody, he'd just write, "Fill."

Ted's grid diagrams are generally meant to illustrate very precisely how he wanted the chord and moving lines to be played, but after thoroughly learning one of his arrangements or other chord study exercises, it is okay for the players to add a bit of his own interpretation to the music. Ted encouraged students to experiment with applying "delays" (separating the melody and the harmony) to give some lyrical element to the arrangements. Or perhaps one might like to add some extra moving bass lines between chords, or try sliding into a chord, or throw in some hammer-on's, slides, or some artificial harmonics (harp harmonics, or "chimes," as he called them). He didn't want others to mechanically clone his playing.

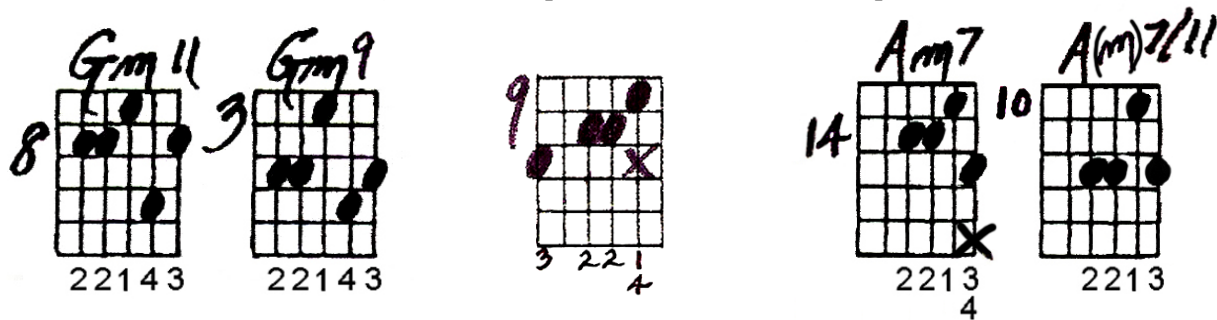
### Fret Number Placement

Fret numbers are placed to the left of the chord grid, usually parallel to the uppermost note. In later years Ted put the fret number parallel with the root note of the chord. If the chord diagram contained no root, then the fret number was placed parallel to the "visual" or "invisible" root. This is a root that is located within the fret span of the chord form (or in very close proximity to it), based either on the 6th or 5th string (but not always). This becomes a point of reference for the other chord tones. Placing the fret parallel to the root (or visual root) encourages the guitarist think of the chord name as he plays the chord, instead of just memorizing some shape, randomly placed on the fretboard.

### Special Techniques

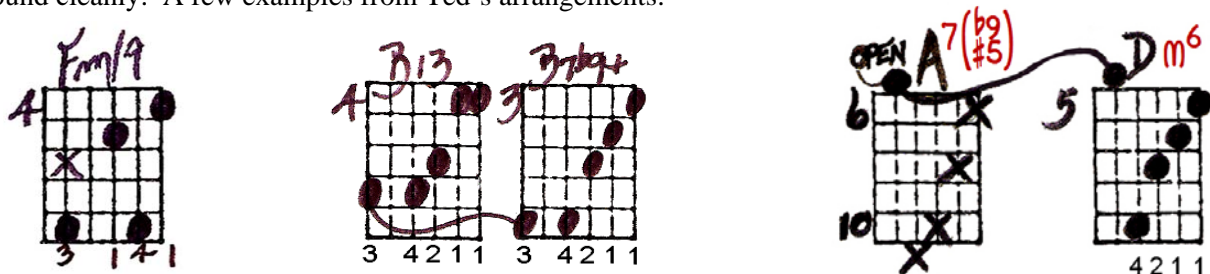
In order to play Ted's music you'll need to adopt some special techniques:

*Double-stops with a single finger.* This comes up very frequently. Ted wrote about this, "We can define the double-stop as a technique where you come down with the tip of your finger right *between two strings*, so as to sound them both." A double-stop is not a barre, and it is used where a barre would muffle strings that should ring, or when there's not enough physical space to place more than a finger tip (like above the 15th fret). See more on this in *Modern Chord Progressions*, chapter 1. Here are some examples:

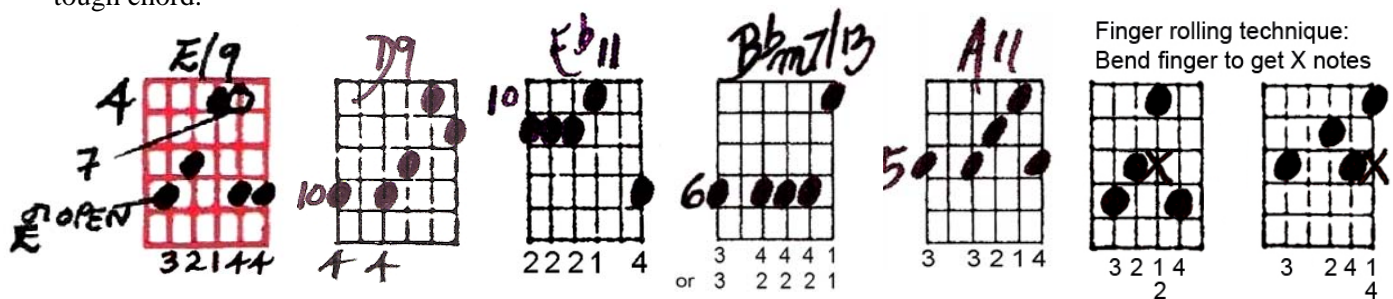


The *George Van Eps Fifth Finger Technique* is something that Ted learned from George and used quite often. It could be described as "a diagonal first-finger barre." It is employed when you need to use one finger to play two notes that are not on the same fret. It's always done with the first finger. You play the lower note with the top joint of your finger, then slant your finger sideways (backwards) and catch the other note with the side of the finger, somewhere around the area of the knuckle. Here's how Ted described this: "To perform this technique, the tip of your finger gets one note, and the side of the 3rd joint of the finger gets the other..."

It doesn't require too much effort to get used to this technique, but you do need to work on getting the notes to sound cleanly. A few examples from Ted's arrangements:



*Partial Barres:* Ted had incredible control in his left-hand fingers and could make partial barres and backward bends with any finger, seemingly effortlessly. I'm sure he would attribute this to a lot of hard work and patience and say that anyone could achieve the same if they just put in the time. He wrote out his arrangements as he heard them and didn't compromise the chord choices because they were difficult to grab. Nonetheless, if a person was having great difficulty with a certain chord, he would tell them it was okay to leave out one of the notes or replace a note with an optional voice—but at the same time instruct them to continue working on the tough chord.



*Finger Rolling Technique.* This is related to partial barres. You start with a normal, curved left finger placed on a note and roll it down into a barre so that it's slightly bent backwards. Ted describes this in *Single Note Soloing, Vol. 1* (pages 13 and 14) as it pertains to single-note soloing, but it can also apply to moving lines in chords. This is a difficult technique to perform well, so don't feel bad if you struggle with it.

### To Pick or Not to Pick?

Sometimes guitarists ask, “Do I have to play fingerstyle in order to play Ted’s arrangements? Can I still use a pick?” Well, you can get by using a pick...to a degree. Ted used all five fingers of his right hand. His chords are generally intended to be plucked rather than strummed. The hybrid technique of using a pick plus fingers will work fine for many situations, but not all. The main difficulty appears with some of the unusual chord voicings that Ted often used, which utilize split voices—sometimes notes on strings 6, 5, 2, and 1. You can’t really strum such a chord, but you could arpeggiate it or pick the lower ones and finger the upper ones. So if you decide to use a pick, you’re going to have to make some changes and compromises along the way.

Ted had almost no fingernails on his right hand (picking hand), as he preferred the softness of the flesh over the nail. However, when it came time for single-note soloing, he definitely used a pick! By the way, Ted was left-handed, and he felt that it was advantageous for his style of playing to have the dominant hand control in the fingerboard hand (but that doesn’t mean that he thought right-handed people should play guitar as a lefty!).

### Non-standard Chord Names

For a complete list, please refer to Ted’s page on “Chord Construction (Formulas)” in the “Lessons” section of the tedgreene.com website. Or see *Chord Chemistry*, chapter 5.

A slash through a number means major (Examples:  $\overline{7}$  = major 7th,  $\overline{9}$  means major 9, and  $\overline{13}$  means major13). A plus sign (+) means raised 5th unless it comes before 11 (+11), in which case it means raised 11th. Other standard symbols that he used frequently: triangle for major; circle with slash for “half-diminished” or minor7b5.

Ted used /9 as the symbol for an add9 chord: D/9 = 1,3,5,9.  
 For a dominant 7th that contained a 6th (or 13th), Ted differentiated between those voicings that contain a 9th and those that do not:

- Dominant 7/6 = 1,3,5,b7,13(6)
- Dominant 13 = 1,3,5,b7,9,13(6)

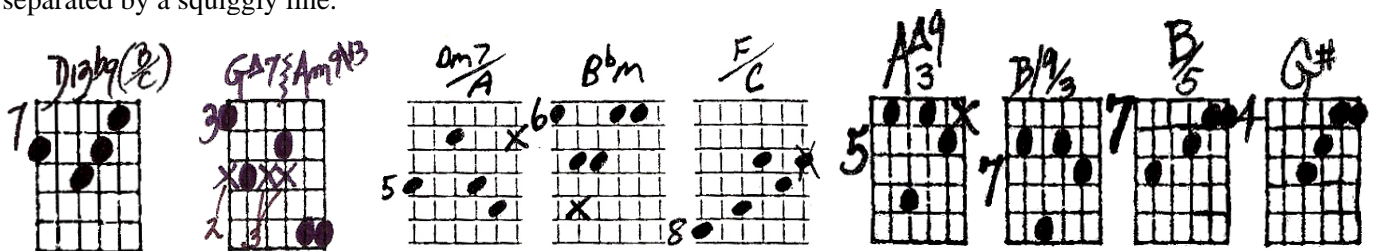
The same thing applies for a minor 11 chord—with and without the 9th:

- Minor 7/11 = 1,b3,5,b7,11
- Minor 11 = 1,b3,5,b7,9,11

Also for major 13, with and without the 9th:

- Major 7/6 = 1,3,5,7,13(6)
- Major 13 = 1,3,5,7,9,13(6)

Ted used the *forward slash* (/) to separate chord tones that are named in the chord symbol. Another way he used a forward slash was to indicate a bass note, which is the common practice: C/D means a C triad with D in the bass. But Ted normally used the slash bass notes only for notes other than the 3rd, 5th, and 7th. These are standard inversions, and he didn’t think it was necessary to indicate the bass—unless he wanted to emphasize a specific moving bass line, or when he talked about “bass-energized” triads, or for other times when the bass was of great interest. But usually he didn’t indicate the bass explicitly. He might have a C7 chord with an E in the bass and just call it a C7. So C7 can mean any inversion (any chord tone in the bass), not just root position (root in the bass). A number under a slash indicates the chord tone in the bass. Sometimes a chord diagram will contain two separate chords, the first chord shown by the solid dots, the second one by the X notes (some of the solid dots may also be included in the second chord). In cases like this Ted would provide both chord names, separated by a squiggly line.

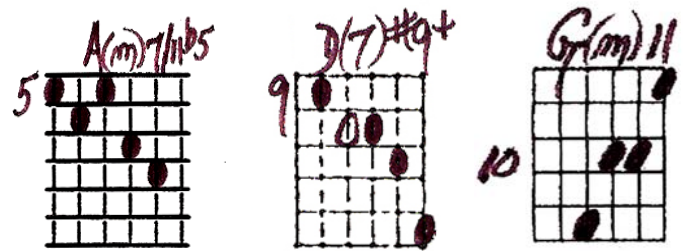




Sometimes he would use a *backslash* (\) to indicate a specific note or voice to be played in the soprano (highest note). So, a G9#5\B or G9+\3 would both mean: 1,3,#5,b7,9 with the 3rd voiced on top. Although rare, I've even seen it where Ted used a forward slash to show the inversion *and* a backslash for the soprano voice, such as: Am9/C\5, which is an A minor 9 with C in the bass and E on top.

For standard chord naming, parentheses are often used to group altered tones, as in C7(#5b9), but Ted usually skipped the parentheses and just wrote C7b9+ or C7b9#5.

Often Ted used parentheses to indicate chord tones that are implied but not present in the actual chord. The implication involves the context in which the chord is used. For example, C(m)7/11 means that the 3rd of the chord, Eb, is left out of the voicing—but in the context of the musical passage the 3rd, had it been included, would have been a flatted 3rd (Eb, not E).

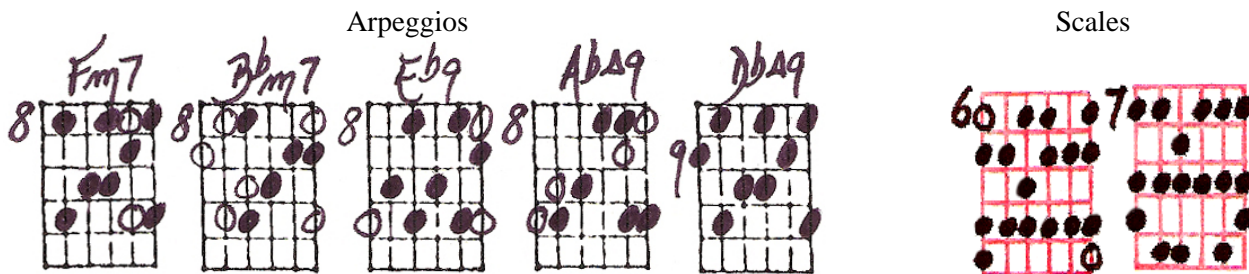


Chapter 5 of *Chord Chemistry* is about polytonal chords (“polychords” or “bitonal chords”). These chords are written with two chord names: one above and one below a horizontal line. This is how these chords are commonly written. Even though Ted wrote about these chords, they almost never appear in his lessons or arrangements. I believe he was mostly explaining the theory and spelling behind these chords.

On occasion Ted has used figured bass to his chord names, but this is almost exclusively in his baroque or classical theory pages and doesn't pertain to reading his chord diagrams—and they are usually added to his Roman numeral chord analysis.

### Single-Note Soloing

For single-note soloing, Ted often illustrated scales or arpeggios as “outlines” over chord progressions. Solid dots show the available scale tones in a particular part of the fretboard that can be used over the given chord. Circles indicate optional tones. The notes were to be practiced ascending, descending, in sequences, and freely.



Sometimes for scales he used finger numbers instead of dots:



## How to Proceed

Another common problem for guitarists is to feel overwhelmed by the amount of material embodied in a single lesson sheet from Ted. Here is what James Hober wrote about this:

*During a lesson, I asked Ted, “What is the best way to study one of your sheets?”  
Luckily I took notes on his answer. He said to follow these steps:*

1. Teach the fingers to play straight through.
2. Teach the brain to follow:
  - a. Names
  - b. Roots
  - c. Sopranos
  - d. Basses
3. Transpose.
4. Extrapolate. For example, learn other chords from those in the sheet by:
  - a. Transferring them to other strings.
  - b. Raising or lowering one or two notes of a chord an octave
  - c. Systematic inversion

*This is one of the very most important things he ever taught me. As you can see, if you really work at these steps, in this order, a single sheet can teach you an enormous amount. If you're like me and often barely make it past step 1, you've still accomplished something wonderful.*

—James

Ted often encouraged students to be selective and focus on the things that they love in music, and not feel that they have to learn every scale, chord, and arpeggio. Diving deep into the areas you love will magically open other doors along the way.

There's a lot of other notation that Ted wrote on his pages with arrows, dashes, lines, and other directional markings, most of which are pretty self-explanatory. For now, I think you have more than enough information to decipher the majority of Ted's pages. A good place to start in the tedgreene.com website is the “Fundamentals” section. Also go to the “Arrangements” section and find one or two of the easier pieces, tunes with which you are familiar, and work on those. Be sure to check out the “From Students” section to see if the song has been notated (many have been done)—I think you'll find them very helpful. Keep in mind that rhythms are usually not explicitly indicated in the grids. The rhythm is somewhat up to the player to interpret as he feels. A guiding principle when playing one of Ted's chord-melody arrangements is to make the rhythms conform reasonably to the melody of the song. This can be done several ways, and one should explore different approaches. In his lesson sheets and arrangements Ted lays the groundwork, and it's up to us to make it fly in the direction we feel our musical wind blowing. Work hard on the elementals and the music will soar.

Good luck!

The image shows four guitar chord diagrams in red: Cm7 (8th fret), Fm7 (8th fret), Bb7/6 (6th fret), and Eb7 (5th fret). Below them is a musical staff in G major with a treble clef and a key signature of one flat. The melody consists of quarter notes: G4, A4, B4, G4, F4, E4, D4, C4. The accompaniment consists of chords: Cm7, Fm7, Bb7/6, and Eb7. The lyrics are: Fly me to the moon \_\_\_\_\_ and let me play a - mong the stars. \_\_\_\_\_