## III. Learning The Fretboard

## A. Finding Pitches On The Guitar

(Learning the notes on the fretboard according to the pitch distances within the C major scale.)

The natural notes (i.e. no sharps or flats; aka the white keys on a piano; aka the C major scale) are:

C D E F G A B | C D E etc.

On the guitar, along a single string:

1 fret = a semitone.

2 frets = a whole-tone.

The distance from:

C to D = 2 semitones = 1 whole-tone = 2 frets

D to E = 2 semitones = 1 whole-tone = 2 frets

E to F = 1 semitone = 1 fret

F to G = 2 semitones = 1 whole-tone = 2 frets

G to A = 2 semitones = 1 whole-tone = 2 frets

A to B = 2 semitones = 1 whole-tone = 2 frets

B to C = 1 semitone = 1 fret

So, all the natural notes have 2 frets distance between them; except for the distance from E to F and B to C, which is only 1 fret.

This pattern of semitones (2212221), as found in the C major scale, is the same for \*all\* major scales, by the way.

G major scale = G(2) A(2) B(1) C(2) D(2) E(2) F (1) G

F major scale = F (2) G (2) A (1) B (2) C (2) D (2) E (1) F

Etc.

So if you know that your open 1st string is tuned to E, then it is a simple matter to figure out that F is found 1 semitone above that - at the 1st fret.

Still on the 1st string:

G is found at the 3rd fret, 2 frets above F.

A is found at the 5th fret, 2 frets above G.

B is found at the 7th fret, 2 frets above A.

C is found at the 8th fret, 1 fret above B.

D is found at the 10th fret, 2 frets above C.

E is found again at the 12th fret, 2 frets above D.

F is found again at the 13th fret, 1 fret above E.

etc., etc.

F# (aka as Gb) is found 1 fret above F or 1 fret below G.

G# (aka as Ab) is found 1 fret above G or 1 fret below A.

etc., etc.

F<sub>b</sub> is "enharmonically equivalent" to E.

E# is enharmonically equivalent to F.

C is enharmonically equivalent to B.

B# is enharmonically equivalent to C.

With this simple bit of knowledge, any note, anywhere on the fretboard, can be found or identified.

## Try this:

Make 21 little squares of paper, and on each square write one of the 21 possible pitch names (excluding double sharps and double flats):

A, A#, Bb, B, Cb, B#, C, C#, Db, D, D#, Eb, E, Fb, E#, F, F#, Gb, G, G#, Ab.

Put these squares in a hat, and pick them one at a time. Choose a string, and try to find each pitch more quickly each time.

Also:

Play a note anywhere on the guitar, on any string.

Now name it.

Repeat many, many, many more times.

It takes a while, but with constant practice, eventually this becomes second nature. I have found that this is the \*best way\* to learn where the notes are on the fretboard.

Many novice rock guitarists get hung-up on using octave transpositions of the 5th and 6th string when attempting to identify notes on the higher strings. This is a natural by-product of having first learning the roots of all the "power" chords on the 6th and 5th strings. But, believe it or not, that method takes much more time, is less accurate and is actually more confusing than the method I am suggesting.

When looking for a note on any particular string, just get into the habit of counting through all the notes on that string, from the open string upwards. If you're looking for a note that is far away, alphabetically, from the open string's pitch, then learn to count backwards from the 12th fret. For example, if you're trying to find A on the 2nd string, then count backwards from the 12 fret (B), rather than upwards from the open string.

It is therefore extremely important that you develop the ability to think through the musical alphabet both forwards and \*backwards\*:

GFEDCBA