From The Bottom Up: *Night Train*
Ray Brown Bass Line and Solo
Methods, Analysis, Function, and Context

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ABSTRACT

This study profiles one of the most influential performances of the modern jazz piano trio, Night Train by the Oscar Peterson Trio. This study will be an in-depth analysis of bassist Ray Brown's contribution to this recording. The various physical, structural, and harmonic, techniques employed as well as the context of the performance will be considered. In addition, The work's historical significance from the perspective of the double bassist in jazz will be discussed, and the influence it has precipitated acknowledged.

This study is for the benefit primarily for bassists and musicians working in conjunction the transcription as a instrumental study. It is advisable for players to first work with the transcription, without the overtly analytical tactics employed herein, avoiding becoming more intellectual than musical. This is a joyous piece of music that is comes from a feeling first. It is important to experience the material in this way, to enjoy it and connect with the humanity being expressed, later breaking it down into its individual parts in order to enhance further this emotional reaction to it. Music, like the human body, cannot be separated into pieces as if those segments were independent of one another. Music is an interconnected entity that needs to be experienced as a whole thoroughly before the individual "organs" can make sense.

That being said, to understand the depth of connectivity, artistry, and taste involved in this recording is to give Ray Brown accolades that move beyond the casual enthusiastic plaudits and historical acknowledgments in order to justify this performance for what it is: An interpretation of American blues with a level of sophistication rarely matched in the 45 years since it's documentation, and with specific justifications for such an exalted claim.

Acknowledgments

The author wishes to express gratitude for those who encouraged and assisted in this project: Dr. Todd Coolman, Sherrie Maricle, Mark Helias, Mike Holober, Chris Rosenberg, David Epstein, and Kathleen McGovern.

I. Overview

Chapter 1. Introduction

Arguably the most influential bassist of the modern era, Ray Brown (1926-2002) was a master instrumentalist who took to a new level of excellence the rhythmic and ensemble innovations of bassists Jimmy Blanton, Wellman Braud, and Walter Page, while combining them with the virtuosity and bebop innovations Oscar Pettiford and Slam Stewart. Ray created a style that set the standard for swing, skill, technique and taste from the 1940's onward, which are still benchmarks for bass players today. Many of the most influential examples of his skill are arguably in the work he contributed to the Oscar Peterson Trio, one of the most eminent being the revered December 1962 recording of *Night Train*, from the album of the same name.

I. Ray Brown

Ray began playing the bass at the age of seventeen in Pittsburgh PA. Originally wanting to be a trombonist, Ray's brass future was nixed after his father informed him he could not afford to buy him one. There was, however, a bass available at school. His first professional job was at the age of 17. Heavily influenced by Jimmy Blanton, Ray Moved to New York in 1945. By 1946 Brown was working in the seminal large bebop ensemble led by Dizzy Gillespie along with (at various times) the vibraphonist Milt Jackson, drummer Kenny Clarke, and the pianist John Lewis .

"Ray Brown, on bass, played the strongest, most fluid and imaginative baselines in modern jazz at the time, with the exception of Oscar Pettiford."[1]

By this time he had already performed with Charlie Parker, Bud Powell, Max Roach and Milt Jackson, Art Tatum, and Hank Jones. In the late 1940's his career took him to Norman Granz' Jazz at the Philharmonic concert series, where he would eventually meet and work with Oscar Peterson. Eventually he moved to Los Angeles and was able to become a mainstay of the studio scene of the period. Ray continued his high profile as the eminent voice in jazz bass, performing with the likes of Duke Ellington, Count Basie, Art Farmer, Jimmy Rowles, Buddy Rich, Clark Terry, Benny Carter, Cedar Walton, Elvin Jones, and J.J. Johnson. He would go on to win a grammy for his composition "Gravy Waltz", and would continue to lead and record with all-star groups until his passing in the summer of 2002.

II. The Oscar Peterson Trio

Ray Brown helped form some of the most influential trios in jazz, along with virtuosos pianist Oscar Peterson (b

[1] Dizzy Gillespie, Al Fraser *To Be or Not to Bop* Da Capo Pr March 1985

1925). The two first performed together as a duo during a celebrated 1949 Carnegie Hall performance as Peterson debut for Norman Granz's Jazz at the Philharmonic concert series. The performance was heralded, and Peterson recorded, and began touring with Brown in 1950. They first recorded together that same year as a trio with several guitarists, most famously Barney Kessel and later Herb Ellis. The trio recorded seminal trio records, including *The Oscar Peterson Trio at the Stratford Shakespearean Festival* and backing legendary performers such as Lester Young, Ben Webster, Ella Fitzgerald, Louis Armstrong, Roy Eldridge, and Stan Getz.

The approach of the early trio was one of high expectation, a desire to be the best working unit of its kind in jazz. "I used to say to the guys", Peterson commented " At our worst we have to sound better than the best guys out there. Whenever we came to town, we established a level that only got better. And the level of the next visit, you could rest assured it would more'n likely be higher."[2]

When Herb Ellis Left the group in 1958, Peterson and Brown replaced him with drummer Ed Thigpen. Success for the group continued, and scores of influential recordings followed.[3] While the interplay had changed due to the addition of drums, the high standards and expectations remained. The group became one of the most influential trios of it's kind in the world, direct influences from this trio style being readily be seen in the work of Monty Alexander, Benny Green, and Dianna Krall.

III. Ray Brown, the Bassist

1. Sound

Ray Brown had one of the most easily identifiable and consistent sounds of any bass player to ever play jazz. The use off the word large should not be confused with the word loud necessarily, as Ray was a player that utilized skill and technique, not just muscle. His sound had ample bottom, a thick and gooey low-midrange, and a percussive bite that allowed him to cut through large ensembles, and provide a nimble foundation for smaller groups. If virtuoso bassist Gary Karr has made the analogy of a great bass sound being like the taste of chocolate[4] , then Ray's sound would be comparable that of a t-bone steak. As Oscar peterson states, "I believe Itzhak Perlman could pick up any violin, and it's a $19.95 job, and I don't think many of us would be aware of it...Ray has that kind of talent. He is a walking sound. Ray has a sound that he walks around with that he can't even describe, within himself. I don't care what he says."[5]

Ray's development of sound was a continuation of the refined right hand technique stemming from the innovations of Jimmy Blanton, heard definitively with the Duke Ellington Orchestra in 1940-41. Pizzicato technique of the early swing era employed a combination slap/pull technique to produce a pizzicato sound in the right hand. Players like Walter Page, in order to maximize volume and percussive impact from the instrument, would grab the string (gut of course, with very high action to produce needed string tension), pulling it outwards away from the

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[2] Lees, Gene *The Will To Swing* (Westport: Prima Publishing 1990 p140
[3] A complete discography of the trio can be found on the excellent web site Jazzdisco.org.
[4] Gary Karr, *Basically Karr* Amati Productions
[5] Ibid.

fingerboard and allowing it to snap back into place. The technique was not unlike an orchestral pizzicato, but on a much larger and physical scale, incorporating enough pull on the string to snap it against the fingerboard. It also allowed the player to incorporate a second right hand technique, the slap. Just before grabbing the string to "snap" a note, the player could use the open palm of the hand to slap the fingerboard as the hand came down to the fingerboard. This could produce more sound, and a percussive effect that could be quite spectacular.[6] This technique created a very percussive sound, but also a very short one. Sustain was a luxury many bassists could not afford in the battle for presence and volume. Brown comments:

"There is a definite difference between bass players now and bass players in my early days. Growing up in the 'thirties and 'forties, you were more involved in sound, basically. You couldn't afford to get too involved in technique, because you didn't have any amplification. There was one microphone in front of the whole orchestra, and the bass player was always at the back. Unless you were with Ellington—then you were up front. But it was very difficult to project; the faster you played, the harder it was hear what you were playing. It was a physical problem in those days. That's one of the reasons the instrument wasn't played as well—certainly not as fast."[7]

Blanton was the seminal innovator who popularized a new approach to pizzicato sound production on the bass, more evident to contemporaries because of Ellington's exacting demands for an additional microphone being placed near the bass for recording. Instead of slapping, he would use the side of a finger, pulling the string outward, directly away from the fingerboard, without snapping it back into place, or striking the fingerboard. Combined with a sure and solid left hand, he was able to dramatically increase the amount of sustain possible and add a great degree of clarity to the notes he produced. This technique of using a "flying" right hand instead of a pull and slap stayed in use during the 1940's and into the 1950's as a dominant way of producing sound in a jazz context.

In the late 1940's onward, with a small amount of credit given to improvements in string manufacture, Ray Brown became the most visible proponent of a third technique where the side and most of the skin of one finger of the right hand and pull the note down toward the player, to the side and with the finger coming off the string and in to the fingerboard upon the release. This had three distinct advantages to sound production:

- Stretching the string to achieve needed volume, allowing it to rebound and vibrate in an ellipse, without the string itself making contact with the fingerboard. The string was able to vibrate freely, with out interruption and greatly increase the amount of sustain possible.

- The finger rolls off the string not unlike a hand releasing the bow when firing an arrow, and strikes the fingerboard, giving the sound a distinct percussive point to the note. Because a large part of the finger could be used for this percussive effect, the sound darkened and became much fuller, and fatter.

- Because of this increase in sustain and depth to the tone, the pitch was much more discernible adding to more precise intonation. An individual nuance could be achieved that greatly added to the potential of the player to develop a personal sound.

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[6] Milt Hinton's performance of *Pluckin' the Bass* with the Cab Calloway band is a most notable example of this technique.
[7] Tomkins, Les. (1963). *Sound and the Bass* Jazz Proffesional

Both hands maintained constant contact with the fingerboard, increasing sustain, maximizing tone, and enabling the player to be present without larger amounts of volume. "You don't have to play loud to swing, you can play soft and swing."[8]

Over the next decade this would become the established method of tone production on the bass for most modern jazz styles. Ray could be observed with a very particular placement of his right hand, near but not passed the end of the fingerboard. This provided the maximum vibrating string length upon release, while still maintaining the percussive element of the fingerboard.

It should also be noted that throughout his career, Ray predominantly used one finger (index) for pizzicato. In the 1940's, this was necessary because it was not possible to produce an adequately voluminous sound alternating fingers, as it would isolate sound production in the smaller muscles of the hand and wrist instead of the upper and lower arm. What would seem like a disadvantage became an advantage, as one finger technique had the byproduct of completely even notes, as they were all produced with the same length finger, coming from the same relative position between hand and string. This one finger technique was used by Ray Brown throughout his career as a predominant method for pizzicato.

Ray's sound had a far reaching influence, and influenced generations of bassists, most notably fellow members of the 1990's bass trio "Super Bass" John Clayton and Christian McBride, as well as Lynn Seaton, Jay Leonhart, and Todd Coolman. Bill Crow states the concepts of tone and influence:

"Ray started right out with good pitch, a big sound, and the technique we used to call 'the long sound', that is, making each note ring into the next one, giving the bass line continuity and a singing quality. His early work with Dizzy, both in small groups and in big bands, served as a model for me when I was learning the instrument. I didn't know how to finger a bass, but I knew from listening to Ray and Oscar Pettiford and the records of Jimmy Blanton and Israel Crosby what I wanted my bass to sound like."[9]

2. Set Up

When dealing with issues of tone, many inquires are directed at the particular characteristics of instruments and gear as the tools that may aid and enable various characteristics. A 1963 interview exchange illuminates many aspects of Ray's set up and technique, and gives fellow bassists needed insight into his equipment and concept during this period of his career:[10]

> "My best bass is an Italian around 200 years old. That's also violin–shaped, but with a flat back and it's a large bass. The machine head keys are unusual because they are open through their centers.

[8] Ray Brown *Master Class by Ray Brown* BBC television 1974

[9] Lees, Gene *Friends Along The Way* 2003 St. Martins Press p72

[10] Ray Brown *Bass Quiz* Conducted by Les Tomkins and Arthur Johnson. 1963

What type of string setup do you favor?

It's according to what suits the particular instrument. On this bass, I have rope–cored steel strings. The Italian bass gives in best results with a gut G and D and a metal A and E. Lots of orchestral players use all metal strings: they're good for bowing. For pizzicato playing, the metal G and D strings tend to cut into the fingers. I prefer the gut; they have a more flexible 'feel'.

What about the string height from the fingerboard?

You have to decide that according to the type of playing you want to do, and how responsive your bass is. The higher the strings, the bigger the tone. But for speed solo playing, you need to press the strings down easier, so they need to be closer to the fingerboard. If I put the third finger of my left hand flat on the fingerboard at the bottom end, and it slides comfortably under the strings, that's the height that suits me. The curve of the bridge is related to the curve of the fingerboard. It should allow you to bow any of the strings in the high register, without the bow touching the next string. The D and A strings are set the highest. I like all four to be as near the same relative height as possible.

What height do you set the bass for playing?

It depends on the width of the shoulders, etc.: but should allow you to reach all the notes as easily as possible. I have mine five inches from the ground, with a wooden peg of fixed height. As it suits me, it doesn't need adjusting.

Can you tell us how you pick the string?

I wrap the first section of my index finger round the string and snap it back. Usually just the index finger, but occasionally with the second. I come from the older school, where one finger for picking was the thing. The two finger style. has come in with the younger men.

How hard do you pull?

You find out what the instrument will take without killing the tone. The tone has to sing. With the left hand you apply an equal pressure to match the pull of the right hand. In each position, the fingers should be over their respective notes, ready to press when required. I keep my left hand as relaxed as possible, and don't hold the fingers rigidly in position as though a teacher were standing over me."

3. Time, Subdivisions

Ray's approach to time can be traced back to his role model, Jimmy Blanton. Brown gained a reputation for admittedly playing ahead of the beat, with bassist Jay Leonhart relating the following:

"Wherever I put the beat, he was ahead of that. I realized later that that was how he made his living. He was not going to be behind *anybody*. He was later quoted as saying 'I made a living rushing the beat."[11]

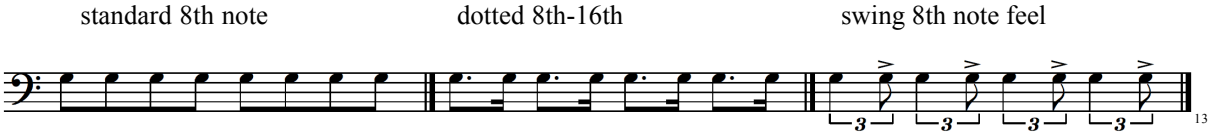
Relative placement of the note in relation to an overall beat, as well as the forward motion termed swing is based on the flexibility involved in a poly rhythmic process of rhythmic internalization known as subdivision. There is a very strong sense of this subdivision in Ray Brown's playing, regardless of the rhythmic value used in the moment. Ray's acclaims as a soloist never kept him from pointing out what was primary in regards to the instrument:

"Most people who think about bass or bass players think about solos. They tend to measure the greatness of a bass player according to the way he solos. But to me, the major, the primary function of bass violin is time...There have been a lot of different concepts in the last decade, and a lot of experiments made on the instrument and in conjunction with other instruments. And there has been a tendency to get away from basic time. But I don't think bass can ever get away from time."[12]

Assuming that the quarter note (in 4/4 time) is our reference pulse, a musician can either play a subdivision of that beat (8th notes, triplets, 16th notes etc.,) or a super division (half notes, dotted half noted, whole notes, etc.,) Even with longer note values, the musician must keep a mental awareness of where the faster subdivisions of the beat are in order to keep an accurate and propulsive sense of motion.

The most fundamental of these subdivisions is the swing 8th note pulse that is most closely related to the triplet:

Example 1. Subdivisions of a quarter note



[13]

The 8th notes in jazz are often (but not always) played as swing 8ths. We hear the upbeat moving to the down beat, thus making the upbeat the antecedent to the downbeat. This creates a perpetual forward motion[14] that continuously leads to the next note and pushes the music forward to the listener.

This process exists in three layers. First, as mentioned above, the player usually has a reference to the quarter note itself (or a longer note value that serves as the primary pulse of the piece). A foot usually taps on 1-2-3-4 etc., which we can term this the reference pulse, a longer value that serves as a primary middle ground for larger and smaller units to be related.

[11] Lees, Gene *Friends Along The Way* 2003 St. Martins Press p79
[12] Ibid p.136
[13] All musical examples will be in bass clef unless otherwise indicated.
[14] Hal Galper's tritise *Forward Motion: From Bach to Bebop* 2003 Myriad Publishing

While important, it is not as vital as the smaller subdivisions (in jazz the swing 8th notes) which keeps the quarters in line.[15] The strong feeling of the upbeat allows the player to place the downbeat with motion and precision. On this foundation all other rhythms can be placed thanks to a sure idea of the many concurrent layers of the pulse.

The third dimension is the players ability to hold multiple perceptions of the same pulse simultaneously. For example, when a player plays a swung 8th note line, and then suddenly shifts to swung 16ths, as if the straight 8th note was now the quarter, and the time is given a double time feel. Here the player is free to choose between several subdivisions to create interest, tension, release, and add subtle rhythmic shading to a phrase.

This effect is achieved in Ray Browns playing by his exacting right hand which executes the beginning of each note by pulling the string, but also by a meticulous left hand technique that gives the feeling of subdivision through consistent and expertly executed beginning and ends of the notes. The process is comparable to the independence exhibited by a drummer: If the high hat gets slightly behind or out of sync with the ride cymbal, the rhythmic picture looses its crispness and focus, resulting usually in the tempo dragging, or not feeling together.

The left hand serves a similar function on the bass. The timing of a finger coming down on a note must be before the note is sounded, otherwise a noise (usually a thwack sound) occurs. Great bassists practice endless amounts of shifting exercises to make sure the left hand moves with enough speed to keep up with the right. At the same time it is important that the release of the note be just as exactly and executed with as much control to keep the notes full, and even. Even the slightest discord between the hands results in a less that desirous lack of phrasing focus.

The end of the note has a slight yet important character aside from the perception of where in relation to the beat it occurs. The player can effect the swell of the note by the left hand's facile adjustments in pressure, and control the sound on the other end of the note. As the string comes up off the board there is a very minute effect that occurs as the left hand releases the pressure needed to keep the string down. This almost imperceptible sound and ability to control it creates an evenness that is likened to that of the effect produced by one finger of the right hand. When both hands are in sync, the inner activity of subdivision becomes observable in the notes, even if they are quarter notes because the player has exacting control over the beginning, end, and dynamic contour inside of that note. Brown explains:

"Bass is a two handed operation. A lot of people think it's a matter of pulling the string. But you have to match the pressure of the left hand to the right. A lot of guys will pull hard with the right, but the left will be weak in comparison. Matching the hands - that's one of the secrets of a good sound."[16]

[15] At faster tempos a larger superdivision (a whole or half note) is necessary as a cohesive element, and is more primary than the subdivision of an 8th note.
[16] Lees, Gene *Oscar Peterson The Will To Swing* Prima Publishing 1990 p.137

4. Economy

If a bassist wishes to produce the note "G" an octave and a fourth below middle C, there are 4 ways to do it. The first three ways are to finger the note in its' corresponding place on the D, A, and E strings. This of course involves the left hand fingering the note, and the right producing the sound. The fourth way is to simply play the open G string, where the left hand would do essentially nothing, allowing the string to vibrate freely. The choice to use one of these four ways is dependent on the context, and what makes sense as far as eliminating awkward shifts, string crossings, or the color of a particular string. Because the bass is so large, the player must cover a lot of ground in a short period of time, and must make use of these various options to accommodate the music and the physical demands of negotiating the size of instrument. This is the general idea of economy, using knowledge of the instrument itself in order to work only as hard as needed to produce the optimal sound desired, and no more.

When playing pizzicato as in a walking bass line for example, an open G string has advantages over the placed G on the D string for several reasons; It has more string length and is louder, It permits the player to cross strings with the left handed if needed, and it requires no use of the left hand allowing the player to shift to any position on the neck without having to shift between two notes that need to be connected. String crossings and shifts are two of the biggest obstacles on the bass because of its size, an open string can momentarily nullify those concerns.

Economy refers to the knowledge needed and creativity used in discovering how to play what one wishes while dealing with technical issues, and then adding the ability to use the instruments advantages of tuning, open strings, harmonics, positions, or anything else the player can use to maximize musical output. When transcribing great bass lines one notices the ability of a great line not just to sound good, but to be playable and clever in it's execution, aided by the players use of this concept of economy.

IV. Bass line Construction and Voice Leading

It is assumed the reader has a basic understanding of walking bass line construction.[17] For the purposes of this article it is important that the reader keep in mind some essential elements of bass line construction and voice leading.

Bass line construction essentially falls into three general areas: Scalar motion, chordal motion, and chromatic motion. Scalar motion utilizes elements found in scales that are related to the harmony of the moment, chordal motion uses notes that spell out chords in the piece (or that are substituted), and chromatic notes belong to neither category, used to embellish chord or scale tones, or to create ambiguity.

Voice leading is the process of leading into the downbeats of where one chord changes into another. Basic ways to approach (or voice lead) into a downbeat with a new chord root is to be sounded include a half step above or below, a step above, or a perfect 5th above (transversely a 4th below.)

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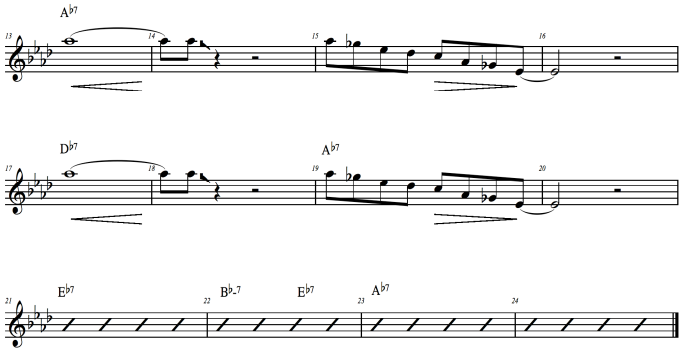
[17] Todd Coolman's *"The Bottom Line"* from Jamey Abersold Press, and Mike Richmond's excellent "*Modern Walking Bass Technique"* from Ped Xing Music are excellent reference works outlining the art of walking bass.

These rules are but a basic outline, and do not necessarily need to be followed in every case. The art of bass lines is the ability to find inventive and useful ways of deviating from standards in order to "break the rules." The only important rule is to sound good, with all "rules" of bass line construction created after the fact for purposes of identification.

V. The Tune: Night Train (Happy Go Lucky Local)

The song most famously known as "Night Train", began as a riff from a Johnny Hodges release entitled "That's the Blues Old Man" recorded in 1940 on the RCA label. The track featured many of Duke Ellington's band, including Duke himself and Jimmy Blanton. A blues in Ab, the second riff (not the head itself) becoming later the basis for first theme of *Night Train*. This fragment will be labeled "theme one" in Night Train. This theme consists of a two bar question, followed by a 2 bar response:

Example 2. "That's the Blues Old Man" Johnny Hodges 1940

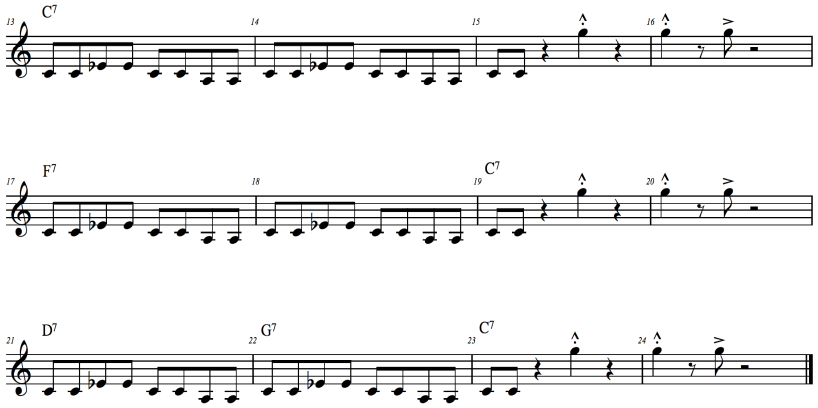


A later Ellington composition coming out of 1946 "Happy Go Lucky Local"[18] , features the second part of the melody, ending with the famous "blap... BLAP.....**BLAP**!" The Initial recording (part of Duke Ellington's Deep South Suite) was in two parts, the first part a series of sounds, call and responses, and orchestration effects use in the manner of a tone poem. Describing the effects produced by a train, there is no identifiable melody until part 2. Here it becomes a 12 bar blues with the famous theme, (as heard on Oscar Peterson's recording at 28 seconds in.) This theme will be labeled theme 2. [19]

[18] November 25 1946, RCA label

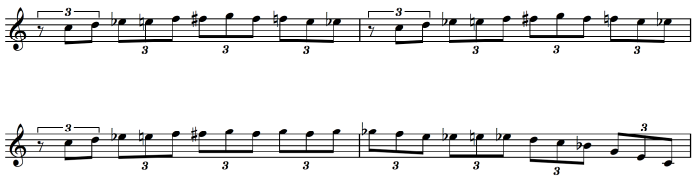
[19] The numeral two is not to indicate that this melody is secondary to theme 1, in fact it is not. Because it is a consequent phrase to theme 1 in the presentation of night train, it will be labeled as such.

Example 3. *Happy Go Lucky Local* melody (1946)



The piece also features the famous "send off" phrase that announces the soloists. A frenetic series of ascending then descending triplets:

Example 4. *Happy Go Lucky Local* send off phrase 1946



Duke Ellington discusses the symbolism of the piece in his autobiography:

"This told the story of a train in the South, not one of those luxurious, streamlined trains that take tourists to Miami, but a little train with an upright engine that was never fast, never on schedule, and never made stops at any place you ever heard about. After grunting, groaning, and jerking, it finally settled down to a steady medium tempo." [20]

These two themes were eventually combined by saxophonist Jimmy Forrest in November of 1951, labeling it "Night Train"[21] and resulting a mild hit record with it upon its release in 1952. The piece employed more of a rhythm and blues feel than a jazz presentation. Coincidentally Forrest was in the Ellington saxophone section for the original recording of "Happy Go Lucky Local", but conspicuously the writing credits for this release did not

[20] Duke Ellington "Music is My Mistress" 1976 Da Capo Press p184
[21] Single on the United Record Label #110

include Hodges or Ellington, and instead credits Oscar Washington, Lewis P. Simpkins, and Jimmy Forrest. Later the song would be used by such artists as Buddy Morrow, James Brown, Louis Prima, and Bill Doggett.

VI. The Recording

Recorded on December 16, 1962 the 17 tracks that would serve as the source material for one of the Oscar Peterson Trio's most successful recordings was made. *Night Train* would be recorded at Radio Recorders in Hollywood, and feature the then working trio of Oscar Peterson (piano), Ray Brown (bass), and Ed Thigpen (drums). The tune itself was documented in two complete takes. The master numbers from the original session show that the take originally released was take 6 (62vk756-6), while the alternate take released later was take 3 (62vk756-3)[22] . This paper deals with the original issue take 6. Based on the master take numbers of the songs recorded that day, this was the first selection to be recorded.

Notable on this particular recording is the sonic placement of the drums. Drummer Ed Thigpen is very prevalent in the final mix, and the overall volume of the bass (and piano) is significantly down from other recordings by this trio. It does however indicate the degree of subtlety which Thigpen is capable of playing dynamically, not to ever over power the band, despite the in your face style of drum recording. It is important to remember that this was a group that played live, without amplification and varying degrees of sound reinforcement. As potentially the loudest member of the trio, the drums would require the most subtlety and control of dynamics to keep an overall balance in the group.

"Thigpen rivet-cymbal was recorded at almost point blank range, and has sonically dominated every issue of *Night Train*. It may be found objectionable to listeners but is indelible without a significant diminishment of the trio's presence." [23]

Unfortunately, the bass level on the entire recording is noticeable down from other recordings of the trio, and extra attention must be paid in order to appreciate Browns playing fully.

VII. Functions of Chord Symbols

There is an inherent difficulty when applying chord symbols to transcription, and especially so when it is a song which can be as freely interpreted harmonically as blues in G. More often than not a combination of four basic approaches is taken:

- Indicate the basic chords used in common practice or as originally composed (a reference)
- Use the specific chords and substitutions used by the pianist
- Use the chords implied by the bass line

[22] From the liner notes to the 1997 Verve Master edition
[23] Ibid.

- Indicate harmonic content based on what the soloist is playing that moment

With this recording we are faced with the reality that often times there is no agreement between instruments as it relates to a particular moment, and we are left to decipher out own interpretation based on the surrounding context. For this piece I have noted chords as played by the trio (including substitutions) on the melody choruses, but more common practice changes for the improvisations to allow for the occasional variations and ambiguity of the line.

This approach is best when dealing with a music that must accommodate variations in harmonic structure, even from chorus to chorus while maintaining a clear reference for the harmony. This is especially true with bass lines, where ambiguity of the function of a particular note can create confusion. As Oscar Peterson points out about Ray Brown:

"Ray has an insatiable desire- insatiable, absolutely insatiable - to find the right note at the right time...The next time around, you'll see the eyes going, and he'll approach the same spot, then all of a sudden he'll lay something on you, because all of a sudden he hears a better placement of that particular harmonic sequence."[24]

II. Transcription

Night Train

Verve V6-8538

Night Train: Oscar Peterson Trio

Original issue, take 6

Recorded December 16th, 1962 at Radio Recorders, Hollywood

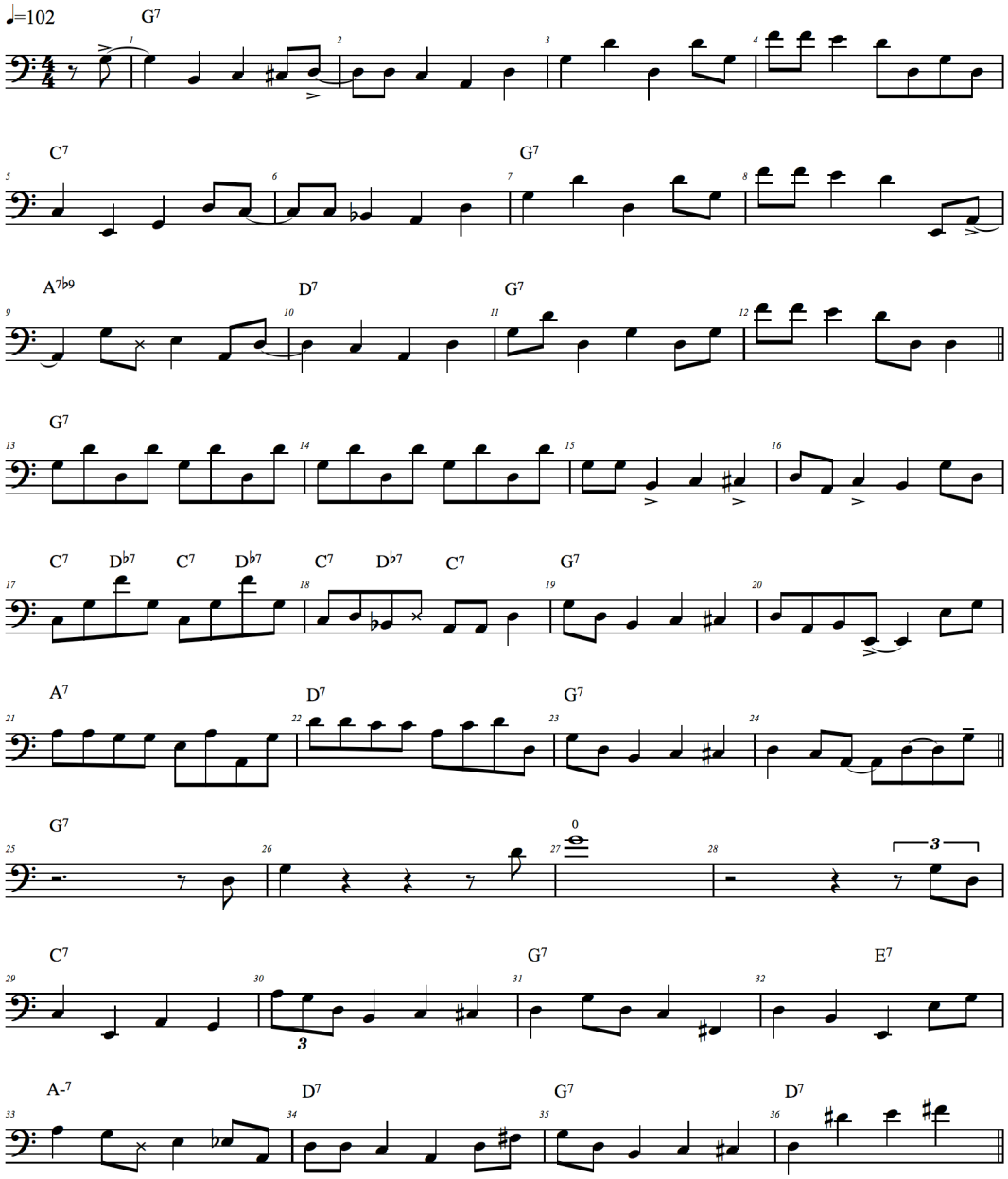
Oscar Peterson, (p) with Ray Brown (b) and Ed Thigpen(d)

[24] Ibid. p.139

Night Train

Recorded on Verve V6-8538
December 16, 1962
Night Train with the Oscar Peterson Trio

Bass Line and Solo by Ray Brown
Transcribed by Robert Sabin



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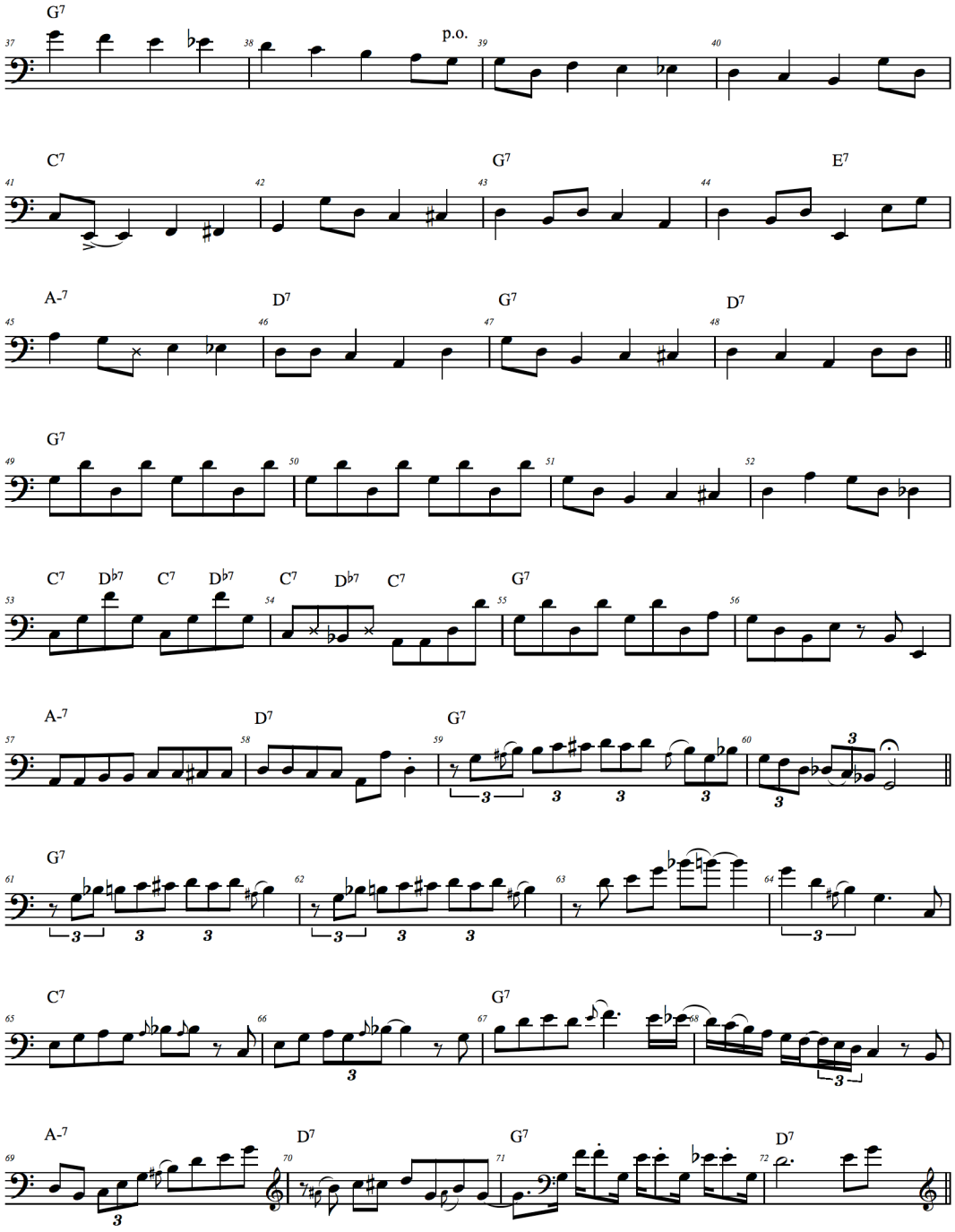
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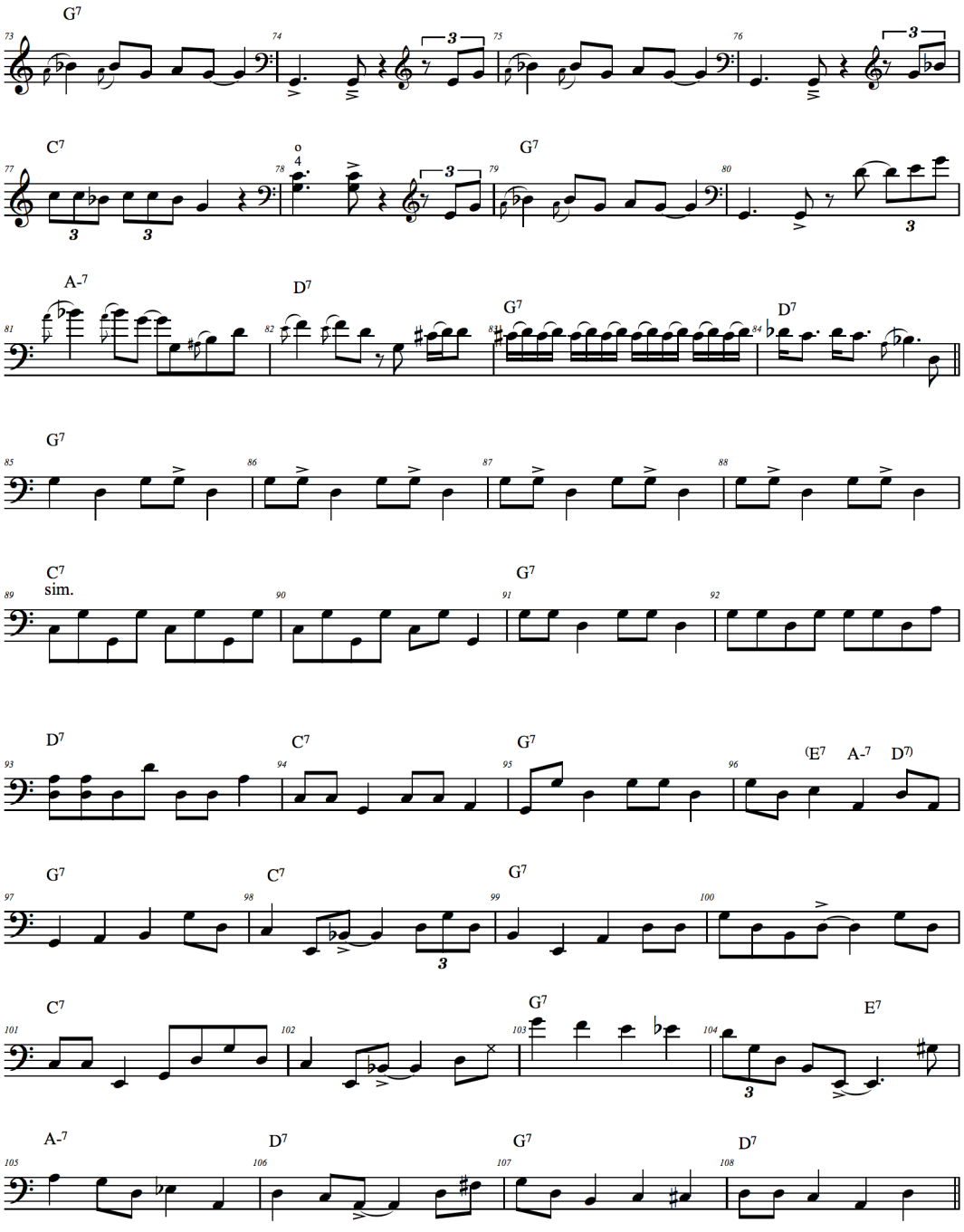
Night Train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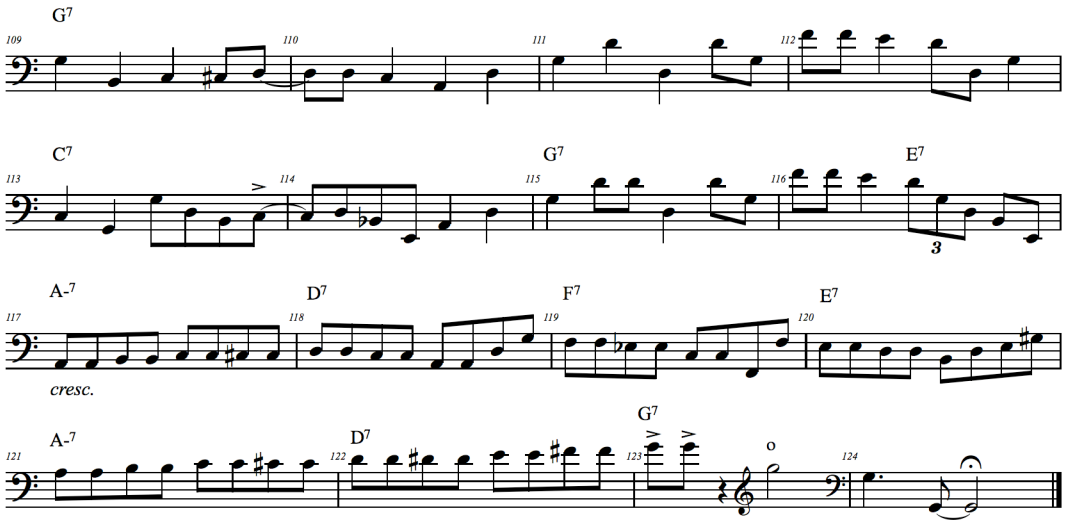
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123
124

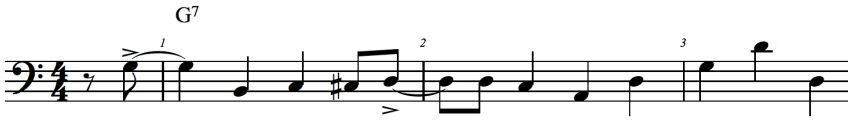
Chapter 2. First Chorus (Theme 1)

I. Bars 1-4

The song begins with an anticipation into the first beat with an 8th note pick up tied into the downbeat G7 chord. Rhythmic anticipations make their way into all of the sections of the piece, usually (as in this case) in the form of ensemble hits made with the rest of the trio. Here Ray doesn't execute a literal downbeat until measure three.

Ray uses the open G string, immediately dropping to the third (B) in order to ascend chromatically up to the D on the downbeat of measure two. This movement from the third to the 5th of the chord becomes one of the unifying motives for the entire piece, and will work its way into the melody, bass line, and improvisation.

Example 5. Measures 1-2

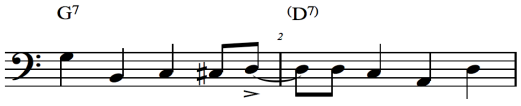


The most important notes are clearly the G on the downbeat of measure one, and the D on the downbeat of measure 2. The G being the higher of the two, we have a motion that is essentially downward. However, Ray uses the drop, and by way of an unprepared series of chromatic approach notes[25] , comes at the D from below.

The second bar is the articulation of a D7 sound without the third (F#) (in fact it is the exact same realization of a D7 chord we see later in measure ten.) This bar uses a reoccurring pattern, the 8-7-5-8 structure over a dominant chord.[26] As Peterson is not playing any kind of D7 chord the effect is subtle, in fact if we substitute a B natural for the A on beat three of measure 2 the chord would be a perfectly obvious demonstration of a continuos G7 using a 5-4-3-5 motion.

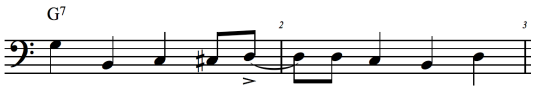
Example 6. Measures 1-2 variation

Original



[25] *Modern Jazz voicings, Arranging for Small and Medium Ensembles* by Ted Pease and Ken Pullig Breklee Press
[26] These numbers refer to the chordtones of a dominant 7th, 8 being the root as played a step above the flat 7th.

Possible variation

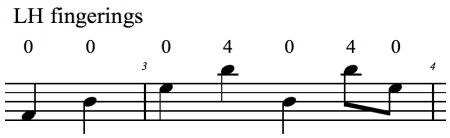


The A natural is quite purposeful. In fact, measures 2, 6, and 10 all have the open A and D strings used on beats 3 and 4, respectively. The notes use the circle of 4ths, hinting at an implied ii-V7-I chord progression, but through diminution occurring inside two beats, and only in the bass. This is an example of ambiguously implying a chord progression without realizing the inner chord voices. It is the strong perfect 4th movement itself which evokes this effect in the listener.

These two notes do more than serve to resolve back to the tonic G smoothly, as their reoccurrence unifies each of the phrases it partakes in, and creates further cohesion in the line by nature of the repetition. These notes are actually the beginning of bar 3's open 5th repetition, begun two beats earlier.

In this third bar we have another pattern that will serve the piece, the root followed by the upper and lower 5th. Almost like a pedal point, the alternation of the G and D provide a textural contrast to the more linear approach in the first two bars. The phrase begins with the A and D from the second bar, and (in an unambiguous case of bass economy) 7 notes in a row are sounded with all but 2 being open strings:

Example 7. Open strings and fingerings:



Already in the first three bars we have several important elements that will recur throughout the work:

1. Use of the open G string for the first principle statement of the tonic, instead of the more substantial G an octave lower.

2. The (ascending) chromatic pattern from the third up to the fifth of the chord (and the key) D.

3. The 8-7-5-8 pattern on a dominant chord, the superimposed D7.

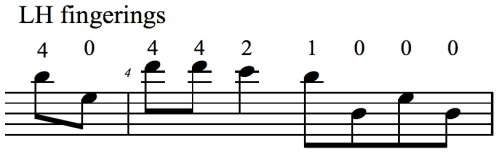
4. The rhythmic anticipation into the downbeats of measures 1 and 2.

5. The use of the 8th notes to add rhythmic variety to the line.

6. The stark open 5ths sound in the third measure by effectively pedaling the root and alternating with the upper and lower fifth.

Ray uses a reoccurring melody in measure 4 as a response to the piano melody in measures 1-3. He does this in the 4th bar of each four bar phrase (measures 4, 8, 12). This phrase is notable for its use of the open G and D strings, as well as the very bluesy F natural (the 7th of the chord) leading down scale wise to the D. Once again we have an approach to the D natural, but this time diatonically from above instead of below as in the first two bars.

Example 8. Measure four solo phrase:

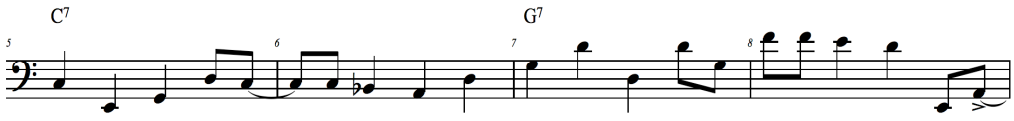


An 8th note drop completes the line into the C in measure 5. This drop also incorporates open strings. While this bass line and solo has many examples of technical mastery, it is the ingenious uses of the instruments natural advantages in positions, particular keys, and open strings that make most of the work so satisfying to play.

II. Bars 5-8

The second four bars follow a similar pattern to bars 1-4, including a linear bass line in 5 and 6, open 5ths in measure 7, then followed by the melodic response in measure 8. Here the C on the downbeat is not anticipated.

Example 9. Measures 5-8



In fact the first interval in measure 5 is once again a descending minor 6th drop to the low E. The G follows, (functioning as the 5th of the C7 chord) and then another example of an unprepared approach note, the D to the C anticipation of the C on the “and” of beat 4. The tied rhythm into bar 6 mirrors measure 2, and from there the line

moves down step wise to the A natural once again on beat three. Further symmetry is observable in the whole step that begins measure 2 (D-C) as well as measure 6 (C-Bb).

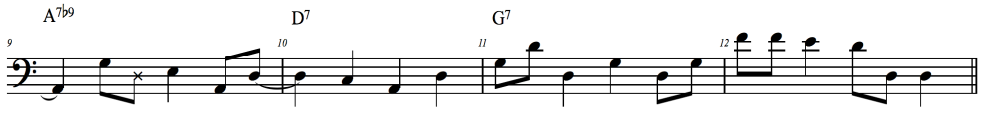
While the A and D do not serve to sound any kind of C7 chord, they again imply an abbreviated ii-V7. Because of the strong resolution back to the tonic in measure 7 they do not produce any clash in the momentary discrepancy of the sounding harmony between the bass and piano.

It is followed once again in measure 7 by the open fifth sound used in measure 3. The now familiar melodic phrase follows, and then a leap of over two octaves down to the low E for another unprepared approach note to the A natural. Here the downbeat of measure 9 is once again anticipated.

III. Bars 9-12

The symmetry in the first 8 bars has precipitated another repetition of the structure of the line, and as a reoccurring pattern in this chorus. Measures 9-12 once again have a two bar linear phrase followed by a variation of the open fifth motif, and the melodic counter statement:

Example 10. Measures 9-12

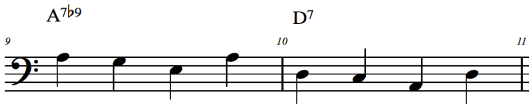


In measure 9, the melody note is a Bb in the piano. Often the chord played underneath is an Eb7 to accommodate (Bb being the 5th of Eb7), but here Ray clearly plays the II7 chord (A7). The melody note Bb then becomes a b9 of the A7b9 chord.

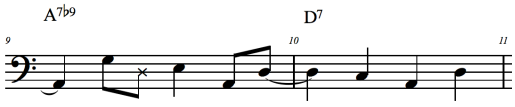
In measures 9 and 10 we see a reoccurrence of the pattern observed in measure number 2, the 8-7-5-8 outlining of a dominant chord. Here it used with the embellishment of a ghosted note (D string on the “and” of two measure 9), octave displacement (the low A on beat one and four of measure 9), and anticipation (“and” of four before measure 10). A literal statement of the idea would look as follows:

Example 11. Strict repetition and Brown variation:

8-7-5-8 pattern



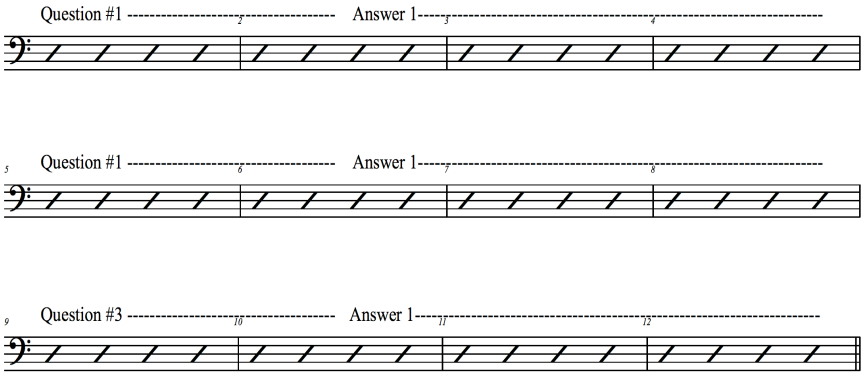
Brown variation



IV. Thematic and Dynamic Contour

The structure of the first chorus can be shown as a series of questions and answers, in a strict structure of 6 beats for the antecedent and 10 beats for the consequent. The linear variations in Bars 1,5, and 9 constitute the questions, while the repetitions that form measures 3-4, 7-8, 11-12 serve as the answers.

Example 12. Chorus 1 phrase structure:



This scheme is also reflected in the corresponding dynamic contrasts used by the trio used in this first chorus. The melody was phrase with a series of contrasting dynamics contoured to fit to fit the shape of the melody:

Example 13. Chorus 1, dynamic contour:

Measure	Dynamic
1-2	f (loud)
3-4	mp (relaxed)
5-6	f
7-8	mp
9-10	f
11-12	mp

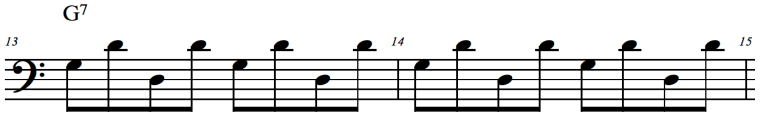
This will end up being in direct contrast with how the second chorus is phrased dynamically.

Chapter 3. Second Chorus (Theme 2)

I. Bars 13-16

With the 8th note boogie-woogie style in the melody, including the piano left hand, Ray uses the open string root (G), alternating the upper and lower 5th (D) motive first used in measure 3. Here it accompanies the beginning of theme 2. These are expressed with a rhythmic diminution and turned into shuffle 8th notes.

Example 14. Measures 13-14 open 5ths:



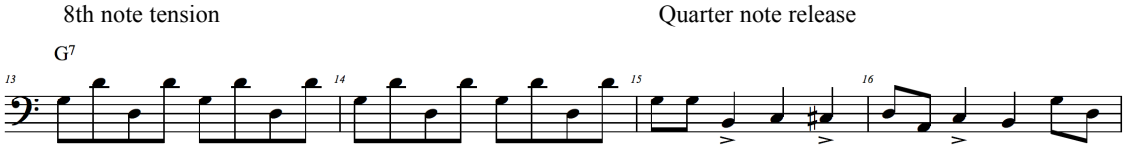
This is connected to (and indeed an expansion of) what we heard in measure 3, 7, and 11. In fact we begin to see that ideas presented to the listener in the opening chorus will be used to help change the and influence the texture of subsequent choruses.

Here Ray consistently gives each upbeat a slight emphasis that helps drives the piece forward. The upbeat emphasis, while a constant presence in most swing styles, are even more prevalent in Night Train. The song, with its roots in Duke Ellington's “Happy Go Lucky Local” and the stride piano style of the 1920's and 30's, draws on a heavy swinging piano left hand, and bass line incorporating these emphasized 8th note articulations.

Most of the second chorus of “Night Train” uses exclusively 8th notes in the bass line during the first two measures of every four bar phrase. The tension created by these 8th notes in measure 13 and 14 is released and contrasts with

the legato quarter notes in measure 15 and 16. They provide a rhythmic tension and release, where the energy built into the 8th notes gives way to the walking bass heard in the subsequent two measures.

Example 15. Tension and release:

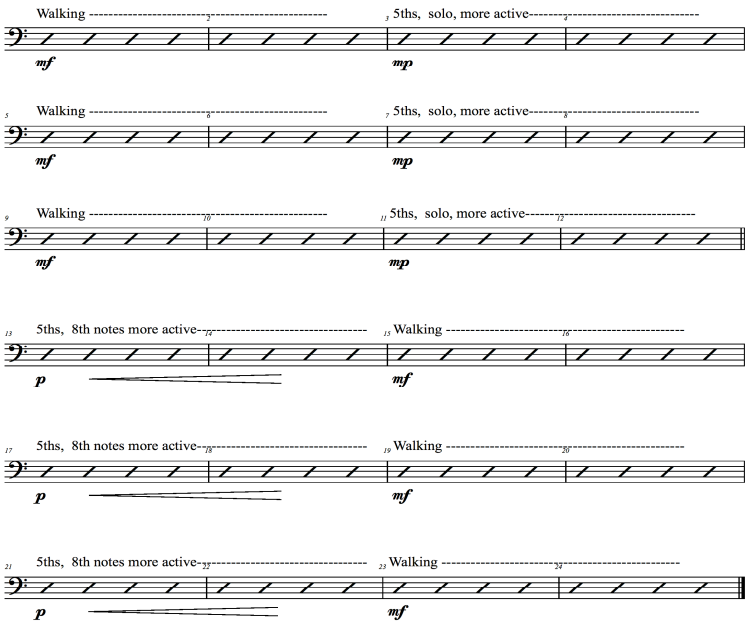


The consequent phrase is once again the line we heard in measures 1-2, with the notable exception that this time the B is used on the third beat of measure 16 instead of the A used on beat three of measure 2.

II. Thematic and Dynamic Contour (Chorus 1)

Here the open fifths eventually yield to the walking line. This is in contrast to the first chorus, where the first two bars are dominated by strong quarter notes, giving way to 8ths and quarters in the second two bars. There is also a reversal of the dynamics: The first chorus is loud to soft, the second chorus soft to loud. This contrast can be summarized by example 16:

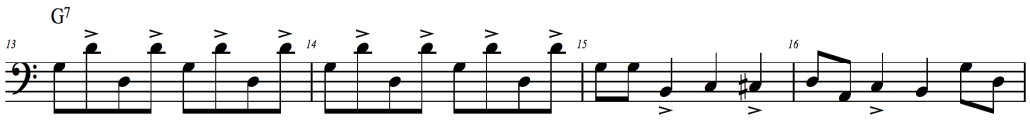
Example 16. Background rhythmic and dynamic structure of first two choruses:



It should also be noted that the dynamics we experience on recordings are not necessarily accurate representations of those that occurred in the studio that day. Mastering and remastering often results in mild to not so mild applications of sound compression in order to improve audibility of audio in noisy environments. It is logical to assume that the dynamics we hear on the record were probably performed more dramatically than perceived on a CD.

The 8th notes give way to quarters, and whereas the upbeat syncopation received emphasis in measures 13-14, now the quarter notes in measures 15 and 16 on beats 2 and 4 receive a slight accent. In each case it is what has been termed the "weak" beat (i.e. the 8th note upbeat, or beats 2,4) that is accented slightly to create rhythmic forward motion.

Example 17. Measures 13-16, syncopation through accent and articulation:

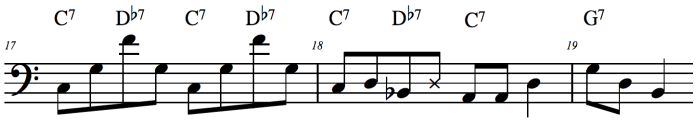


III. Measures 17-20

The second phrase of the chorus once again begins with 8th notes, but with wider leaps, and a conspicuous F on beats 2 and 4. At first glance this high F natural in measures 17 and 18 appears to be "incorrect". The IV chord in those bars is a C7, and traditional improvisation methods teach that the 4th note of the scale, in this case F, is to be avoided as to not clash with the E natural in the chord.

Upon closer listening however, we discover that Oscar Peterson is moving the chord up a half step on beats 2 and 4 to Db7. In this instance, the F natural is a perfect fit, as it is the 3rd of Db7. The shift is facilitated by another sample of Ray Brown's economy by using the open G string, freeing the left hand to shift without obligation up an 11th to the F.

Example 18. Measure 17-18



As Ray jumps registers, the line also shifts harmonic stratum. From the root (C) he moves to the open G (5th) and then the 3rd of the Db7 chord (F) in the upper register.

This line is also notable for being an example of an 8th note line incorporating very large intervalic leaps; a perfect 5th from C to G, and a minor 7th from G to F. One could once again site the similarities to stride piano, where such leaps in the left hand from a root to the inner notes of a chord (in this case the F) were commonplace.

On the 2nd beat of measure 18 Oscar again plays the Db7, with Ray playing this time a Bb. Is there a clash? No. This is because they are both going to resolve strongly to the next important chord, the G7 in measure 19. Momentary clashes of harmony become insignificant if the parts resolve strongly at the next harmonic juncture.

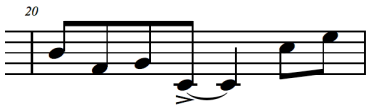
Measure 18 also contains what I have notated as a ghosted note on the "and" of beat 2. Most of the ghosted notes in this piece could also be played as solid notes. The presence (or lack of) discernible pitch in these cases is secondary to the rhythmic articulation of the moment, and is to be treated as such. Often students will obsess about trying to articulate a ghosted note, to the disruption of the rhythmic flow of the line. The "and" of 2 is not as important as landing on beat three cleanly with rhythmic assuredness. Ray states the importance of the resolutions of these rhythmic embellishments:

"Land solid...that's the important thing, because it's an illusion anyway when you're saying pick-e-te-TONG. Hit bottom so it means something."[27]

Once again we have the A and D open strings on beats 3-4 of measure 18 continuing their role of unifying the melody and leading back to the tonic.

Measure 20 offers one of Ray's most potent devices, the open E string, played forte. Here he plays it with a thunderous accent to increase the potency of the anticipation of beat three by putting the VI7 chord (E7) on the "and" of beat 2:

Example 19. Anticipation of E7:



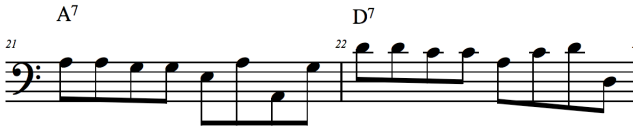
IV. Measures 21-24

For the turnaround of this chorus Ray brings back again a variation of the 8 - 7- 5 - 8 pattern in measures 21 and 22

[27] Ray Brown *Master Class by Ray Brown* BBC television 1974

to outline the harmony. On A7 (A,G,E,A) and D7 (D,C,A,D), although this time they appear as eighth notes. The the D7 is played up an octave from its original position. They are separated by the open G which once again facilitates the shift in position.

Example 20. 8-7-5-8 pattern as 8th notes:



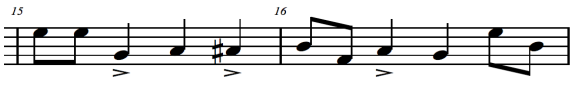
The call and response nature of the first two choruses is ubiquitous when looking at how the various 2 bar phrases of the melody and bass line contrast each other in dynamics, rhythmic texture, and range. However there is yet another example of call and response, or a kind of theme and variation that is present in the bass line in the second chorus.

V. Theme and Variation

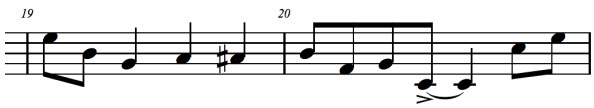
Just as the first chorus offers a repeated melodic response in measures 3-4, 7-8,-11-12, the second chorus offers a similar repetition, although this time with variations. The second 2 bars of each four bar phrase in the second chorus begin the same way, descending from the G string to the 3rd of the chord (B), the first line played in measures 1-2, walking up chromatically. The measure that follows is different each time however, and provides a contrast and unification of the bass line.

Example 21. Variations of consequent 2 bar phrases, second chorus:

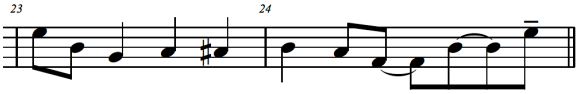
A.



B.



C.



Each phrase begins as if it were a literal repeat, but varies toward the end of the phrase. It is interested to compare the preceding measures with the performance in the alternate take, where this secondary repetition and variation does not take place, Ray opting instead for three separate approaches to this moment. Was this repetition calculated beforehand? It may have been a spontaneous occurrence, or given the meticulous arrangements the trio was known for it may have also been thought out on Brown's part. After years of the trio working out arrangements that carefully considered contrasts, themes and variations, contours, and dynamics, those elements were mastered to the point of becoming a spontaneous process rather than a premeditated one. In any event we see the large scale dynamic developments and contrasts that exist chorus to chorus happening inside of the various 2, 4, and 12 bar sections as well.

Chapter 4. Piano Solo (part one)

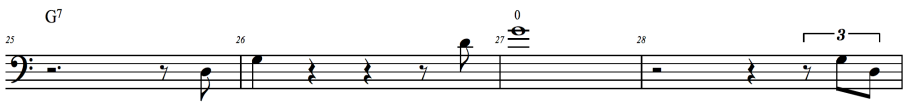
I. The Solo Break

The first chorus of the piano solo brings a new texture to the ensemble. Before we can get there however, the tension from the melody lasts a bit longer into the third chorus in the form of a send off, with breaks in the bass and drums.

The first four bars of the piano solo incorporate a modified version of Duke Ellington's original send off phrase. Ray plays a series of ascending G's reaching up to the octave harmonic on the G. Here is an obvious use of the economy referred to earlier. The high G sounds great because it rings like a chime, fading while the piano break leads into the next chorus. It is a perfect 5th (technically a 12th) above the upcoming IV chord (strong voice leading), and its tone is contrasting the low and substantially pizzed C at the beginning of measure 29. It is also a very easy note to play, and is even preceded by another harmonic, the octave on the D string on the "and" of 4 in measure 27.

Measures 25-28 set up a contrast with the rest of the solo. The send off continues the tension built during the melody in the piano, and delays the eventual release into the walking bass, ride cymbal release into the solo at measure 29. At that point the ensemble exhales, and the meticulousness of the melody arrangement relaxes into an improvised blues. As the ensemble releases, Thigpen moves to the ride cymbal with sticks, the bass moves to the lower octave by way of an open string drop beginning on the second triplet of beat 4 (G-D) as the solo begins.

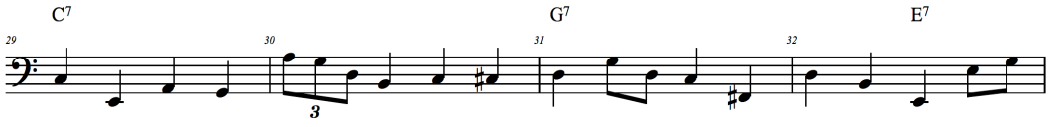
Example 22. Bass breaks:



II. Measures 25-36

Here we have Ray's huge sound on full display. Measure 29 is a release of the tension and constantly shifting dynamics in the first two choruses. Ray even lays into the most powerful note on the instrument, the low E string on the "and" of beat 2 measure 29, to emphasize the dynamic change to a healthy mezzo forte. Here we have now arrived at the focus of every Oscar Peterson recording , the piano solo. Just as some tension is released by the full groove emerging in this third chorus, the release is deceptive as soon it's time to create more.

Example 23. Measures 29-32



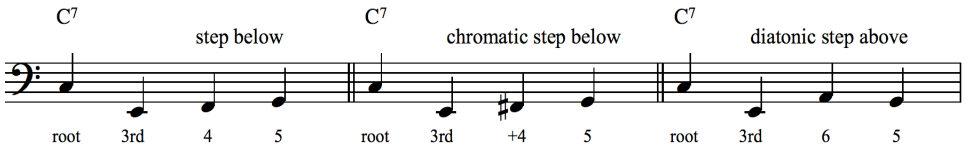
The first chorus of the piano solo features a masterfully constructed bass line in measures 29 through 36. This line has several characteristics that make it supportive and stimulating to the listener that will be discussed in detail.

Traditional analysis of bass lines refer to scalar, chordal and chromatic motion. These measures offer a combination of approaches to bass line construction that are not mutually exclusive, but combine to serve as voice leading techniques. They also serve a larger purpose beside realizing the chord to which they are assigned. There is a background contour that is effective on numerous levels in addition to providing clear harmonic support and directional melodic shape.

Measure 29 offers a chordal approach on the first two beats, the root and the low E. Aside from the dynamic effect of this note mentioned earlier (versus an E one octave higher), it is the 3rd of the chord. Ray has established the harmony in the first two beats, and used the same descending 6th interval he began the song with in measure 1.

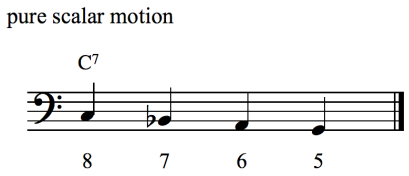
Looking at each note individually, the A natural on beat three measure 29 could be analyzed as part of a C6 chord (harmonic construction) but is really a passing tone serving to get us to beat 4 and the G natural. Leading into the G another obvious note choice could be the F natural (or F#) which would offer scalar and chromatic motion:

Example 24. Methods of resolving to G on beat 4 with an E on beat 2:



Ray chooses the A natural above the G. This less obvious, indirect method of resolution to an important tone becomes characteristic in the rest of the chorus. It should also be pointed out that if the intent was to lead to the G on beat 4 of this bar through the A natural, a purely scalar approach could have been employed by using the Bb natural on beat two:

Example 25. Method of resolving to G on beat 4 with a Bb on beat 2:

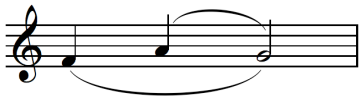


Although there are a myriad of way to work out this bar, Ray choses the indirect resolution. This is an indication of the next several bars to come, where the effect is to ascend overall, but by liberal use of descending motion and large interval leaps instead of a more obvious step wise motion upward. It should also be pointed out that this bar perfectly follows an essential rule of 3rd species counterpoint[28] where chord tones (consonances) on beats 1,2,and 4 will allow for a dissonance on beat three. While this style does not need to adhere to such a strict rule as Mr. Fux's in order to function, it is not a strange coincidence that such an expertly executed line as this would have a frame of reference in an elemental theory of western melody.

III. Indirect Resolution

Indirect resolution[29] refers to two (or more) notes approach a tone by stepwise motion from opposite directions. A simplified example is the movement to a B natural simultaneously from below and above.

Example 24. Indirect resolution:

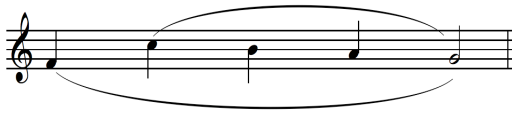


The same concept could be applied through more than two notes:

[28] *The Study of Counterpoint,* Johann Joseph Fux W W Norton and Company , chapter 3 "Here, in the first place, one must observe that if five quarters follow each other either ascending or descending, the first one has to be consonant, the second may be dissonant, and the third must again be consonant...This does not hold if, firstly, the second and fourth notes are consonant, in which case the third note may be dissonant..."

[29] *Modern Jazz voicings, Arranging for Small and Medium Ensembles* by Ted Pease and Ken Pullig Breklee Press

Example 25. Expanded indirect resolution:

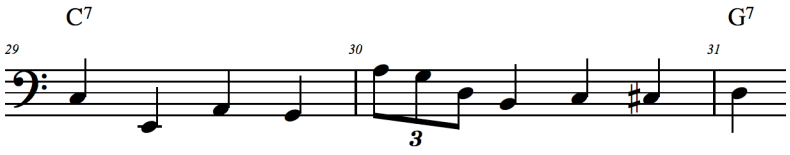


Here the lowest note (A) connects to the B as a passing tone, but only after a descending pattern resolves to the target note (B). Ray will use this concept in the next several measures.

The natural economy of having the open A string at his disposal certainly aids this note choice, but primarily the indirect motion into the G allows the line to overall rise from the low E over a longer period of time, by incorporating downward steps as well as upward. The E in beat two serves as a beginning of a ascending line that will move upwards, from the lowest note on the bass (E) leading up to the high G in measure 37. But instead of just a gradually ascending line moving in skips and steps, the line succeeds in a terraced, indirect resolutions over the course of 8 bars through a shift in ascending and descending intervals.

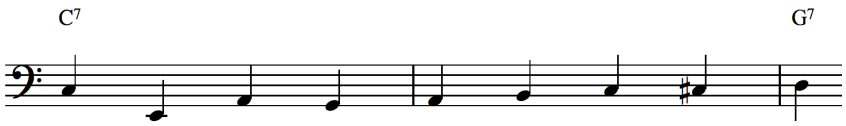
The E resolves upward to G following the indirect resolution of the A. The ascending continues through another indirect motion in measure 30, the large leap up to the A on the down beat and the triplet drop that follows. The line then moves upward chromatically from the B natural on beat two.

Example 26. Measures 29-30



The indirect motion that was a 4th in measure 29 (E to A) is now a 9th from the beat 4 (G) to beat one (A). This high A serves two purposes, the first being a step above the open G string, which becomes an economical choice to set up a rhythmically strong open string drop. Secondly, it is an example of octave displacement. If this note was played as a quarter note, and lowered one octave we would have a very obvious step wise motion up to the D in measure 31:

Example 27. Measure 29 and 30 without triplet and octave displacement:



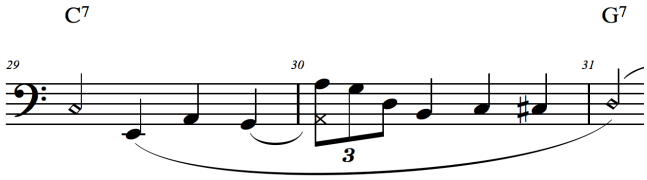
This would not sound very strong because of the repeated A in the same octave from beat 3 to beat one, but combined with the octave displacement and the rhythmic interest created by the triplet, the line is clearly building toward the resolution of the D in measure 31. The triplet also has the effect of emphasizing beat two of the measure, a device that furthers the forward motion in the measure through syncopation and emphasis on the back beat.

IV. Resolutions Over The Bar

Arriving strongly at target notes provide a background structure which if existing strongly can support sometimes extreme derivations from the foreground harmonic foundations of the piece. The fact that improvised lines do take on characteristics of more in depth analysis is an indication of the depth of ability of the player and the inherent function as well as creativity of the spontaneous music.

We can use slurs to show the resolution of notes beyond the adjoining beats, arriving at a diagram where slurs indicate a the starting note which will resolve later in the phrase:

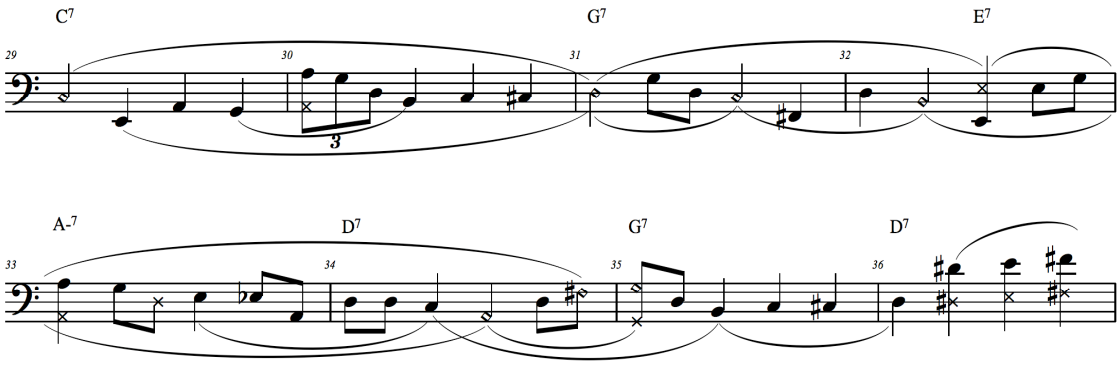
Example 28. Resolutions in measures 29 and 30



In the background the C on the first beat eventually moves to the D in measure 31. To get there we have the illusion of the E moving through indirect resolution to the G, the A (displaced) followed by the B, C, and C#. Ray essentially establishes the chord with the C and immediately is working his way to the next chord change in measure 32. We feel the strength of this resolution but the motion disguises it just enough to not be too obvious. It is also an example of the chromatic ascent to the D we saw in measure 1, but expanded over the course of almost two bars.

Could this sort of analysis be applied beyond 2 bars? Yes, in fact we can see individual voices moving the remaining bars of this chorus moving both up and down from this D in measure 32 to eventually resolve back to the G in measure 35. This upwards and simultaneously downward motion is related to the indirect resolution set up in measure 29, but on a much larger scale:

Example 29. Resolutions measures 29-36



The D in measure 31 inverts the G7 chord, and creates a feeling of unresolved tension to help keep interest in the harmonic structure and eventual resolution to the tonic.

The D skips to the G above to establish the chord, moving in 8th notes down to the C on beat three. This C is the passing tone on the way to the B in measure 32. An obvious and symmetrical place to place the B would be the down beat, complete the D - C - B downward motion. Ray instead delays the B until beat two of measure 32. The low E is once again sounded on beat three of measure 32, but through an illusory octave displacement we can see that motion from the D in 31 is simultaneously descending and ascending at the same time.

It in one sense descends to C and then B, but also functions as a lower neighbor to the octave displaced E on beat three of measure 32. Both motions will continue. The "lower" strand making its way eventually to A on the third beat of measure 34 but not before we have again a variation of the 8-7-5-8 pattern used exclusively so far in the turnaround. Measures 33 and 34 have an individual contour of their own, a descending movement from measure 33, A-G-E-Eb-D-C. This C will resolve to the B in measure 35.

The upper strand has the E resolving to the F# on the "and" of 4 in bar 34. The G is finally arrived on in measure 35, in the higher octave. It is important to note that while these two strands both point toward resolution to a G, the lower aims at the low G and the high strand the High G. Ray chooses to favor the high G resolution instead of the lower octave. This avoidance of the low G will continue through out the piano solo.

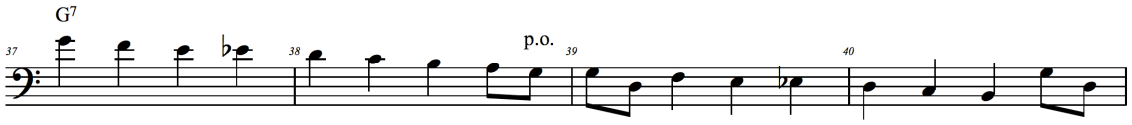
There is a repeat of the ascending chromatic motion we heard in measure one, the B-C-C#, and we are back where we started, the D in measure 36. This time however the upward chromatic motion continues with the help of an octave jump. D moves to D#-E-F-F# before making it back to the high G in measure 37. While the drama of these "mini" resolutions is concluded, there is still an unfinished quality from Ray is holding out the low, more substantial G, and instead ascending to build more tension.

Chapter 5. Piano Solo (part two)

I. Measures 37-48 Walking Bebop Scale

After so indirect motion and angular intervals in the first solo chorus, Ray begins the next with a stark contrast; A high and descending line that's almost entirely scalar. Except for the chromatic Eb on beat 4 of measure 37 and 39, the line is a G mixolydian scale:

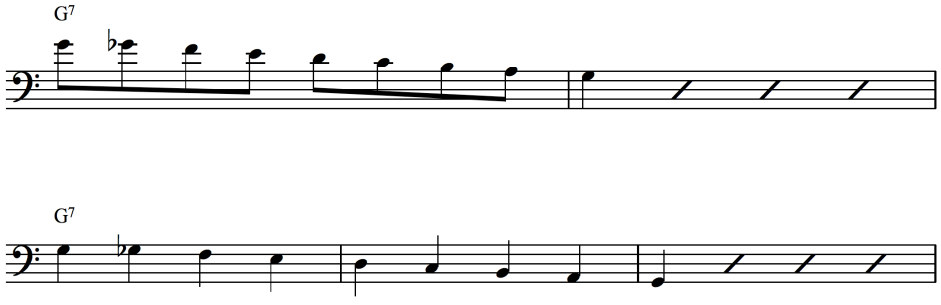
Example 30. Measures 30-34



The contrasts between these two choruses is striking. The overtly angular contour and tension in the first, released with a linear scalar line utilizing over two octaves of the bass. The effect is like a tense balloon slowly letting out its air. Just as with the melody, and the alternation of tension and release every two bars, we have (on a larger scale) a chorus of relative tension followed by one of relative release.

Here is an example of what has been termed a “bebop” scale, but applied to a bass line. David Baker concludes in his book “How to Play Bebop”[30] that a standard bebop scale could be used, simply changing the note values to quarter notes to allow the chord tones to land on the stronger beats:

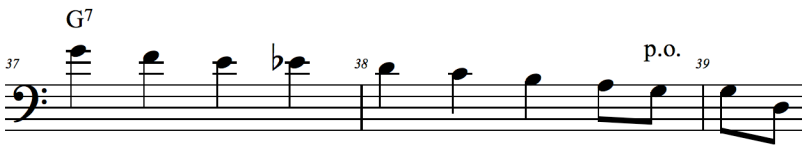
Example 30. G bebop scale:



[30] David Baker, *How to play Bebop vol. 2* Alfred Publishing Co.

While this concept is a common reference when analyzing melodic solos, it is modified in practice when it comes to bass lines. Most bassists (including Ray Brown in measure 37-40) will place the chromatic note in between the 6th and 5th, instead of the root and 7th.

Example 31. Walking bebop scale:



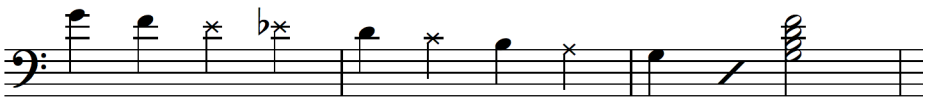
Here we see the following chord tones on strong beats (i.e. one or three): Root, 6, 5, 3. In a strictly chordal analysis, this clearly outlines a G major 6th chord. But there is a linear association as well. Just as in measure 1, we have a double chromatic approach to the D in measure 38, but it is descending.

Which does the ear hear first, this harmonic association or the linear one? It is clear from the two examples that the strong resolution is primary. Conventional wisdom in bass line construction favors a chord tone on the third beat because like the first beat in the bar its strong rhythmic weight allows the pitch placed there to establish the harmony that the player wishes. But do these beats have to serve a harmonic purpose?

Clearly by measure 35's example the answer is no. A "C" on beat 3 under a G7 chord should go against the sound of a G7, but doesn't. Its resolution is infallible, our ear hearing the note in the linear context and in reference not to the chord of the moment, but the sound and chord of the resolution. In fact, many great bassists can place any note at all, at any moment and still find a clear and compelling way to resolve the chromaticism.

Based on this linear resolution, the E in measure 37 is actually less prominent than the F or the D, even though it lands on a strong beat. Our ear hears the downward pull to the "D", and if graphed might look like example 32 indicating a visual representation of the aural experience.

Example 32. Primary tones in walking bebop scale:



This can be looked at as a composing out of the 7th chord, separated by passing tones. It is clear that a half step resolution to a downbeat of the measure is stronger than a whole step.

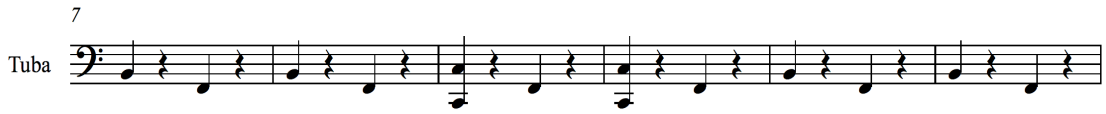
Measure 38-39 also give us an example of a specific left hand articulation technique, the pull off. The left hand (instead of the right) plucks the string, in this case from the A, and sounding the G. This is an example of a technique latter exemplified in the playing of Ron Carter and Jimmy Garrison.

II. Role of the 5th

By this point in the track there has been a ubiquitous presence of the chromatic approach to the fifth when it occurs on the downbeat. In bass lines a strong structural sense of root and fifth can provide a strong harmonic foundation. But why is this? With the various chromatic and scalar motion to the fifth, the open fifth motive in chorus 2, and its important position on the downbeats of important measures, an examination of why this relationship is fundamental to the harmonic underpinning of the song is required.

In a bass line, the most fundamental note to play is the root. The root is the center of the harmony and is the reference for the form and function of a chord. What is the next most fundamental note to play then, in order to avoid the monotony of repeating the root incessantly? Many theorists could point to the third, for it is the third which gives a chord its defining character. But do we hear many simple bass lines in music that repeat "root - third -root - third -root third"? Perhaps there are some examples, but certainly not as many as examples of lines that use the common "root - fifth - root - fifth" approach that has become synonymous with numerous kinds of american music.

Example 33. **Library of Congress March** John Philip Sousa (1931)



The fifth functions as an extension of the root itself. It is the third partial of any pitch. Mathieu states: "The two tones clearly belong together: They are placidly, eternally, and utterly consonant." [31] A bass line that first must establish the root can further its cause and add variety by using the fifth, as it is the closest harmonic relative to the root. The fifth occurs as the second partial to any given note, and has the advantage over the third in a common bass register where a third played harmonically with the root would produce an unclear, muddy sound. By using the fifth we have not moved so far away from the root that its location has become ambiguous, and avoided needless repetitions of the root (or the octave of the root above or below).

The Ray Brown version of the bebop bass line scale is strong for this reason: A clear linear representation of the root and fifth on the prominent downbeats using the chromatic vocabulary prevalent in the bebop vernacular to

[31] W.A. Mathieu *Harmonic Experience* Inner Traditions International page 22

connect them. The linear motion composes through the basic root-5th structure of earlier music styles.

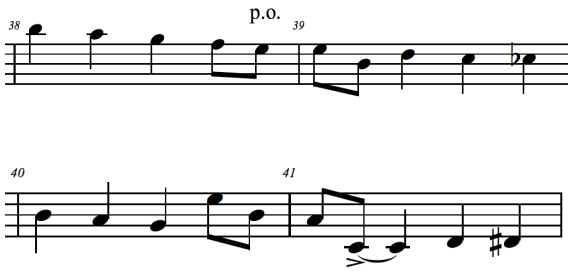
The end of the phrase in measure 40 could have continued the pattern by playing an A on the 4th beat of the measure, but because the chord is about to change to a C7, a shift has to be made in order to voice lead to the new chord. Ray uses a G-D skip on the 4th beat. This is also another example of indirect resolution, where the C is arrived at from above (D) and also from the B on beat three.

These notes obviously are the root and 5th of a G7, but primarily function rhythmically, and parallel the rhythmic accent at the end of measure 38 and 39 (beat 4 to beat one) where a pull off and the open G and D strings are employed. In each case the accents are 8th notes that fall on beat 4, and continue through beat one. These rhythmic accents bookend the phrase, and employ a symmetry that further accentuates the symmetry that pervades the 4 measure phrase.

III. Measures 41-44

Upon arrival at the C7, the descending motion continues in dramatic fashion, by playing a thunderous E on the "and" of beat one. This note is an anticipation of beat two by half a beat, but is a further surprise because of the connection to measure 39, of which it is a rhythmic variant:

Example 34. Rhythmic variant m3-39 and 40-41



A literal symmetrical variant would have been two eighth notes on beat one, followed by beat two. Measure 41 instead adds the anticipation into beat two. Ray continues his dramatic downward motion by landing at the bottom of the bass, the low E string, and getting there suddenly by once again using the preferred descending minor 6th.

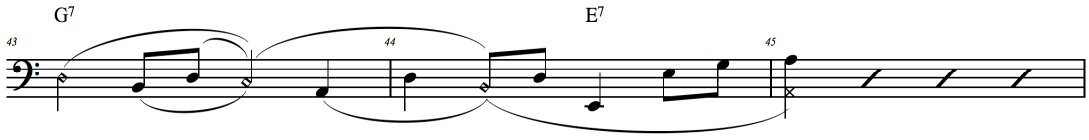
It should be pointed out that the most contributive factor to Ray laying down the E on the and of one would be the overtly bluesy phrase played by Oscar Peterson in the bars preceding measure 41. Almost a wail in the right hand is greeted and responded to by a howl of Ray's own with the accented "and" of one. It is remarkable that given how thoughtfully arranged the piece is within the trio that there is still flexibility to enable an inner dialog like this

between piano and bass. It is an example of communication that is easy to perceive, and for a brief moment the listener can hear and feel exactly what the two master musicians are communicating to each other and to the listener. As if Peterson let out a cry from the pulpit of blues, Ray shouts back with an "Amen!" of his own.

From here the direction shifts and the line begins to ascend through another series of chromatic approaches. From measure 41 we have a chromatic approach from the third (E) up to the fifth. As mentioned earlier, we have the fifth of the chord being used on the second bar of the harmony. This has become a characteristic of this line, where a chord is sounded for two or more measures, the root and fifth are the prevalent choices for notes to place on the down beat. In fact, if we look at measures in the bass line that do not have a root and fifth on the down beat, we only have two: Measure 30 (a triplet drop starting with an "A"), and measure 99 (a third, a rare occurrence). We can find instances in the in head and out head, but only because Ray is playing a melodic response to the riff, and temporarily shifted his role from a harmonic to a melodic one.

The next measures, 43 and 44 offer another opportunity to see a polyphonic element to the bass line, as notes function most closely with notes they do not adjoin. Through the following graph we can see a background movement of D - C- B - A, but with each note preceded by some sort of a neighboring tones:

Example 35. Measure 43-44 resolutions:



The principle notes above are the descending D-C-B-A motion, which unfolds over the course of the two bars. The motion is detailed below:

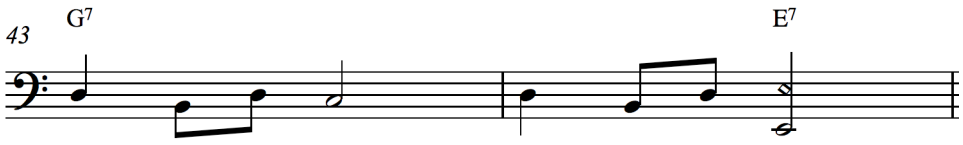
- D - First note, downbeat. Strong sounding open string.
- C - Beat 3. This is preceded by a lower neighbor (B) and an upper neighbor (D) played as concurrent 8th notes. Once again an example of indirect resolution.
- B - Where as the (D) is separated from the (C) by a single beat, there are two beats between the (C) and the (B). The C we are coming from is the upper neighbor, and a lower neighbor (A) occurs on beat 4 of measure 43.
- Instead of an upper neighbor on the following downbeat, we have a repeat of the D from earlier. It certainly functions as the 5th of the chord, but it also is serving to be a neighbor tone for the upcoming E on the third

beat. Here Ray's neighbor tones have begun once again to overlap one another, with a kind of three dimensional voice leading.

- A - The A finally occurs not in the octave we expect, but displaced by an octave. This return to angular motion is in contrast with the overt linear movement of the beginning of the chorus, where expectations are met through a continuos downward scalar motion.

- The E on beat three is the root of the E7 chord, but is on the low E string, and can also be heard as being the upper neighbor (taking into account octave displacement) to the D that will occur in measure 46. It is preceded by its lower neighbor, the D played twice. This is symmetrical again to the beginning of the phrase, where we have the D sounding twice as an upper neighbor to the C, and repeated as the lower neighbor to an E. It is the case of the first two beats of each bar being equal, but resolving in opposite directions.

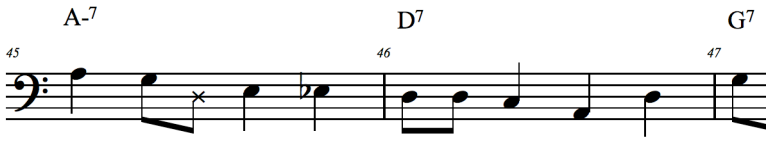
Example 36. measures 43-44 simplified



IV. Measures 45-49

The turnaround measures for this chorus begin with what is now a familiar yet slightly varied version of the 8-7-5-8 pattern we first encountered in measure 9, and then in measures 21 and 33. The line is an almost exact repetition of the line used in measure 33. We have 2 interesting features that were not discussed earlier.

Example 37. Measures 45-46



First, we have a ghosted 8th note on beat 2. This rhythmic accent is echoed on the downbeat of measure 46 by an 8th note D on the and of one. Inside of this phrase which is obviously in 4/4, we have groupings of three, a subtle but present hemiola. The asymmetry produced by this effect keeps the line feeling organic, fluctuating and breathing. It also keeps each accent in effect a surprise, because it is unexpected.

Secondly, we have a double chromatic approach to the D in measure 46, thanks to the use of the Eb instead of the A as in the other turnarounds. The motion is descending all the way, as the tonal gravity of the ii-V7-I progression is reaching its release point. Once again we have an opportunity for the big payoff of all the tension that has been created up to this point in the form of the alluded to low G. Alas, Ray does not give it to us, and the tug of war continues. We hear the upper G on the downbeat of 47, a resolution yes, but one that leaves a gas in the tank.

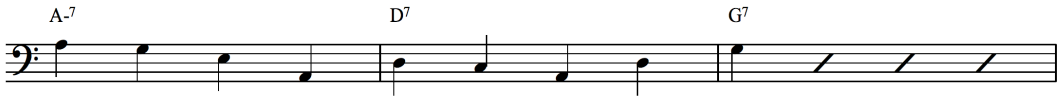
V. Repetition of the Turnaround

With the intense musicality and groove percolating from the trio, does the listener notice the repetition of these two bars from the earlier choruses? Does this use of a repetition serve the music, or is it just a case of Ray pulling out a familiar pattern that works instead of something fresh?

The answer lies in how Ray treats each of the turnarounds in the piano solo choruses in the track. When looked at side by side, we see a unfolding theme and variation structure at work, where the basic pattern (8-7-5-1) is brought back each chorus, but changed slightly to reflect the progression of the music.

The basic pattern could be spelled this way, although it never appears in this form. Each variation could be related back to this pattern on the ii-V7-I:

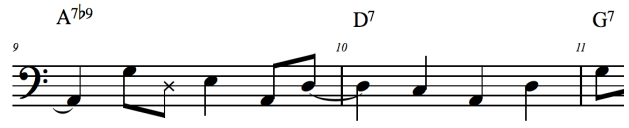
Example 38. 8-7-5-8 template



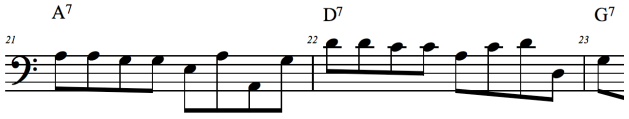
Essentially it represents a sequence of the 8-7-5-1 pattern. This can serve as a skeletal reference as we see the variations that Ray employs through out the melody and piano solo:

Example 39. Variations of 8-7-5-8

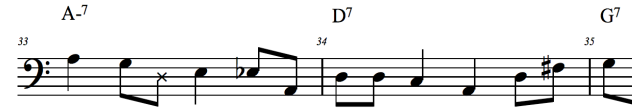
ex. Low A, 8th notes every 3 beats:



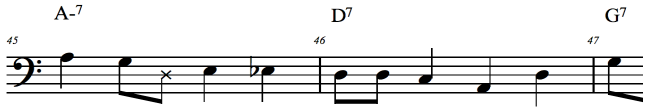
As stride style 8th notes, and an octave displacement:



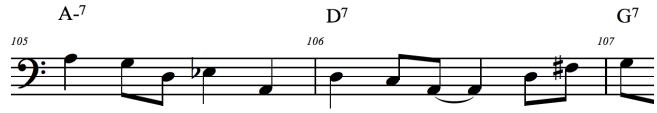
With a double chromatic approach, 8th note hemiola:



Minus two 8th notes:



Anticipation of beat three:



But do we even consciously hear this when listening to Night Train? The symmetry is present, and gives us a structural unity through the choruses, even when the music changes dramatically, but most likely not reaching our conscious attention on the first listening. We may not analytically hear a repetition, but we feel the effect in the background. Its effect powerful and subtle, a background image that is never noticed unless it is looked for, but always felt.

The other natural question to arise from these variations is whether or not this was the intent of the performer. Obviously Ray Brown was capable of creating lines which, as we've seen, can vary dramatically. Was this a

conscious decision? How much of the analysis presented here was premeditated or conscious?

The answer to this may lie in the alternate take of Night Train. In the first two turnarounds of the melody there is new material not related to the theme above. The third and fourth choruses there is. What does this tell us? Was a technique Ray often used, but not consciously in order to accommodate what ever was happening musically in the moment? It would not make musical sense to impose ones will under the soloist to create a background gesture that wouldn't add to the music. However at the same time there was clearly a sense that each part needed to have a degree of self sufficiency. As Oscar himself states about the earlier trio with Herb Ellis:

"And because of keeping the pressure on them, it made for a belief and an approach in the group whereby everyone self-sufficient creatively. Ray Brown believed in what he was doing, so much so that Ray Brown made himself into what he is today in the movie studios and recording field." [32]

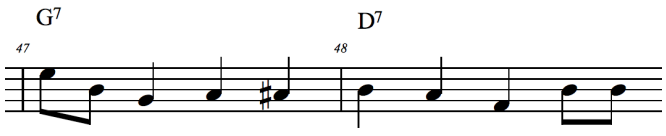
It is also clear that not all decisions we're made by the soloist, but the bass and drums (or bass and guitar as in the earlier trio) could establish a creative line perhaps not in step with the soloist and only noticeably later on. As Peterson commented:

"Different times we'd tape ourselves, and I'd hear these things go by and I'd say 'God *damn* it, they did *that*, they had that going there, and I didn't take advantage of it!"[33]

Perhaps he just had something else in mind, perhaps a sense that the alternate take did not need the repetitions, or to simply create a second take with a different feeling so that there were two contrasting versions to choose from. Regardless, the repetitions are there, and they serve the music well by creating a feeling of depth and swing without the listener necessarily being conscious of why. It is a dramatic lesson in the power of rhythmic variation and development to create freshness out of a similar methods of harmonic accompaniment.

In a further example of what we may term a "call back", (a reference to something that was played earlier in the track) this chorus ends with a variation of the call and response pattern from the first two bars of the melody, in a slightly altered version. This pattern in a sense bookends the piano solo, creating a beautifully self-contained bass line statement.

Example 40. Repetition of bars 1-2



[32] Gene Lees *Oscar Peterson The Will To Swing* Prima Publishing 1990 p.109
[33] Ibid. p111

Chapter 6. Melody Interlude

I. Building

Just as the piano is getting warmed up, the trio takes a dynamic step back and returns to theme two of the melody, here serving as an interlude. We have the deliberate postponement of a dramatic climax of the piano solo, pausing just as it began to rise dynamically. It is as if the solo leaves a bookmark, so as to come back later. This is by no means by accident that we do not have a high point in dynamic or rhythmic intensity of the piano improvisation. As Peterson himself states:

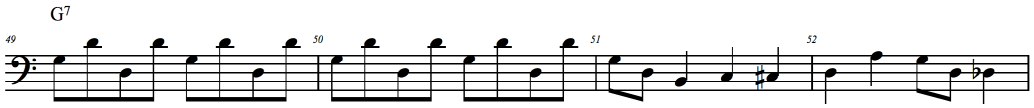
"You should be able to build. You shouldn't build to a summit only to fall off. That is another thing wrong with much jazz piano. When the pianist shifts into high, often he's used up all he's got to get there."[34]

The piece essentially takes a detour in order to make the eventual payoff stronger, a concept Ray is using in the bass line as well, holding off on the inevitable low G until a suitable moment.

II. Repetition

In chorus number 5 we have a return to many of the tension producing tactics that accompanied the melody the first time. In fact, for the first three bars we have a mirror image of Ray's line as it occurred in measures 13-15, with a slight variation in measure 52.

Example 41. Repetition of bars 13-16



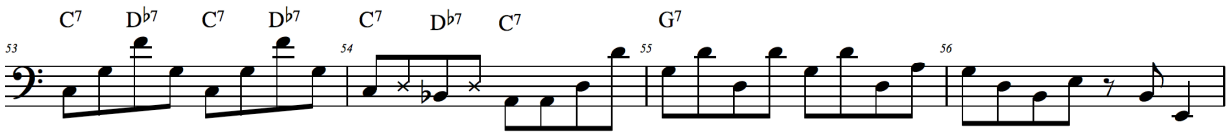
The 8th notes have returned along with the boogie woogie feel, and the consequent release of the quarter notes in measure 51. This is a purposeful decision, as it is existent in the alternate take as well, although minus the quarter note release. Not only has the performance prevented any further crescendo in dynamic, but reinstated the tension creating devices that we're left behind before the beginning of the piano solo. Once again we have a variation of the measure 1-2 line in measure 51-52, with a slight variation in 52 using the Db upper chromatic passing tone to lead to the C in measure 53.

The second phrase (measures 53-56) is also a strict repetition, this time of measures 17-18 with a continued 8th note

[34] Gene Lees *Oscar Peterson The Will To Swing* Prima Publishing 1990 p.146

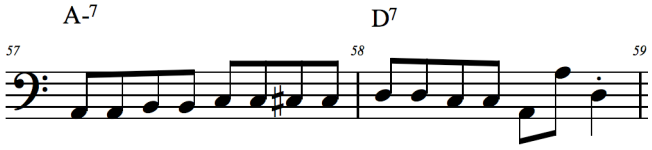
line. Measure 55 is also a direct repetition of measure 48. Eighth notes are used exclusively until the accented E natural on beat four of measure 56. This lowest note is accented through articulation and its relative rhythmic augmentation.

Example 42. Repetition of bars 17-18, variation of 49-50



Measures 57 and 58 introduce an ascending scalar 8th note line from the A string up to the D. This is the first time Ray plays the A7 chord without employing the 8-7-5-8 pattern. It is significant here because this phrase will reappear later as the penultimate phrase of the piece, and in this moment acts as a foreshadowing of that moment.

Example 43. Ascending scale motion, , 8-7-5-8 variation



The trio is very clean in the presentation of this arrangement, with clear forethought of the sequence of events. This interlude was carefully considered as far as placement, contour and effect.

"Oscar wrote arrangements and we rehearsed. It was a very fine tuned organization with a lot of rehearsal and a lot of intricate arrangements to get through."[35]

Chapter 7. Transition

I. The Bass Break

The two bar break in measure 39 is a unique occurrence in the recorded history of the trio, and something of an enigma. As an repetition in form, the last 2 bars of the melody interlude feature a send off into the next solo from

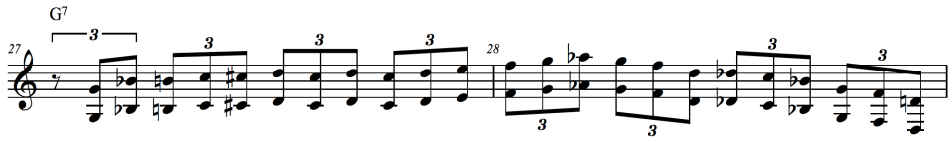
[35] Chris Hoven *Holding Down the Bottom End: Ray Brown's Jazz Odyssey* allaboutjazz.com June 2002

Ray Brown. Whereas back in measure 23-24 the piano played the last phrases of the melody before the piano breaks in measures 25-28, (then establishing the groove of the solo) here the piano ends the melody early and forgoes the final riff in lieu of a surprisingly early solo break for the bass.

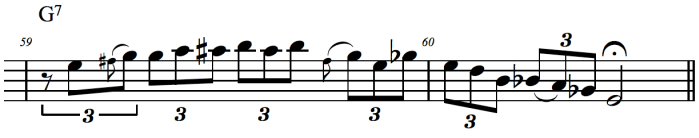
The break itself is again a variation on the original Duke Ellington break, and more directly Oscar Peterson's specific break in measures 27-28. Ray begins with the same motive, but develops the second half of the phrase in a different manner:

Example 44. Solo breaks, consequent phrases:

Piano Break



Bass break



Both lines show a similar construction. Aside from the obvious repeat of the first bar, we have a mix of chord tones, chromatic tones, and notes from the blues scale. In the case of the bass break the tonality of G is established by the G and B natural in the first two notes. As in both examples, they are separated by an A# (if we wish to label it an ascending chromatic passing tone) or a Bb (if we prefer to think of it as more relevant to the blues scale in the key of G.) The note continues upward chromatically to the 5th (D) before descending using the blues scale. Once again we have the movement up from the third chromatically to the fifth that we originally saw in measures one and two of the bass line, now played as a melodic line to begin the solo.

II. Articulation

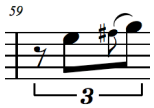
Different combinations and variations in right and left hand articulation are on display here for the first time in the piece. As discussed earlier, bassists in this era used predominantly a one finger approach in order to produce enough sound on each note. In a typical 4/4 walking bass line the right hand would pull the string at roughly the same time the fingers of the left hand came down to stop the string at the appropriate place. In addition to this 1 :1 right / left hand relationship, Ray begins to use slurs and slides to increase what he is able to articulate in terms of variety and velocity.

The grace note into the B natural is accomplished by the right hand pulling while the the Bb is held, and then the left hand "hammers" down to the string to stop the B natural. The right hand does nothing, allowing the note to speak though the vibration still existent from the Bb. The Bb is accented by the articulation of the right hand, but the B natural is the point of resolution and articulated by the left. Through this coordination Ray has gotten two notes for the price of one. This hammer on effect is similar in nature to the pull off in chorus number four, essentially a left hand articulation (coordinated with the right) to dramatically expand what types of expression are available to the jazz bassist.

The importance of left hand techniques as epitomized in the 1950's and 1960's by bassists such as Ray Brown, Ron Carter, Red Mitchell, Charles Mingus and others, moved the expression level of the bass soloist to an equal level with horn players and other string players. Woodwind and brass instruments, through the art of tonguing and articulation make continuous decisions about how to attack particular notes, when to slur, and how many notes they would like to play inside a given slur, dynamics, and duration. The earliest days of the jazz bass player afforded no such option. Each note needed to be sounded individually since the bow was not in use in many cases (Slam Stewart and Jimmy Blanton did however establish their individual voices on the instrument by using the bow for solos, thereby avoiding the intrinsic problems of improvisation articulation restraints.) There was also the demands for pure volume, which diminished greatly the ability to play at lower dynamic ranges and still be present. The result was a uniformity of sound in which the limitations of the instrument were more a part of the articulation decision making process as was the music. These innovations made the generation of players to which Brown, Carter, and Mitchell belong more identifiable as individuals (instead of merely instrumentalists) thanks to the expanded expressive possibilities afforded by the newer left hand techniques.

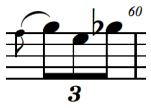
In effect Ray is combining these two thirds (B flat and B natural) into what we can label a "blue" third. The note ends on a definitive B natural, but approaches through the Bb. This can be related to the blues vocal tracing back to traditional singers such as Bessie Smith or Blind Lemon Jefferson. In this style singers could slide through, in between pitches in order to enhance expressive qualities of the melody.

Example 45. Hammer-on:



Another subtle but profound use of the left hand articulation is with the slide from the Bb (again) into the B natural on beat 4 of measure 59. The slide is executed in a similar manner to the hammer on mentioned above, but only one finger of the left hand is used. Another example of the slide, although in a different direction, is the Db to the C in measure 60, most likely executed with the 4th finger.

Example 45. Slide:



The B natural being emphasized in these ways is important for two reasons. First, it establishes the tonality of G major, which is important to issues of the clarity of the harmonic intent. Second the clear establishment of the major tonality allows the use of the blues scale in measure 60 to stand out in contrast. There is a clear juxtaposition of the two colors, the G mixolydian sound referenced by the G, B and D, and then the blues scale (with the Bb.)

Ray's use of the blues scale and his extensive this vocabulary are made doubly effective because he is able to contrast it with a similarly deep understanding of the bebop vocabulary and the ability to present the contrast in character between the two different sounds inside one phrase to the benefit of both. When this masterful use of varying kinds of vocabulary is enhanced by the ample ability to make articulation decisions that transcend the inherent barriers of the instrument a voice emerges that inside the temporal constraints of two bars can produce a sound and a feeling with profound impact on the generations of bassists exposed to it. In short, we hear the player. This is the primary listening experience to the astute ear before it can even consider the idiomatic language, the instrument, or even the song being performed. This what is meant by sound and all that it encompasses beyond (and including) the particulars of tone itself.

The break comes to rest in what Ray has been alluding to (but not delivering); the low G, and with a fermata. While this low G does occur in conjunction with the C7 chord in measures 5, 29, and 42, it functions as the 5th of that chord, and *not* a statement of the tonic. At last we have the most substantial G on the bass in terms of register and impact. This is not accidental, as evinced by the numerous examples of low register playing without this G. In fact *the* G (as tonic) has not made an appearance until now despite this being a blues in the key of G. When we do arrive "home" to the tonic, the point is pushed further by the fact that it is held with a fermata, as if it were the last note in the piece.

III. Deceptive Cadence

This is a rare occurrence of what is truly a false and deceptive cadence, but not in the traditional meaning of a cadence that resolves to an unexpected place. This cadence does resolve to the tonic, almost too well. The pulse momentarily stops, and we are left to think "What is happening? Is this what was intended? Is the song over?"

Clearly from the alternate take the answer is yes. In fact the alternate take has an even more overt cadence at this same moment, but including piano and drums in the gesture as well. When the trio plays this deceptive cadence together in the alternate take the effect is illusory, more glib than urbane. Perhaps it was viewed as too final in its resolution, not leaving enough of the questioning character to keep the track from stopping altogether. At some

point the decision was made to have the bass take this moment alone in order to give the piece a moment of subtle deception, as well as new dynamic from which to begin building to another climax.

There is a dynamic parallel to another of Duke Ellington's Works, "Diminuendo in Blue" and "Crescendo in Blue". The essential character of which is a through composed blues where the first half begins forte and then decresceno's to pianissimo. It reaches this middle section (of the original 1937 recording) before mounting a dynamic comeback that lands the ensemble firmly in the grounds of *FF*.

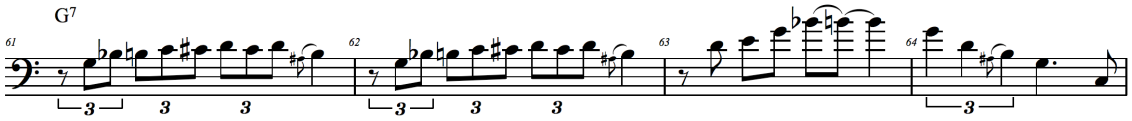
Here also we have the midpoint of the performance, and a dynamic low. This serves everything that is about to come by turning a page in the ear of the listener. This is not two sections of a work dissolving slowly into one another, but a clean break. In fact the very technique (the solo break) that began the solo section now serves to temporarily halt it.

Chapter 8. Bass solo (part one)

I. Measures 61-64 Phrase Structure

The silence and ambiguity of the fermata and the momentary suspension of the time leave the listener with a kind of "Where did it go?" feeling, and from this break arises the "call" phrase from the send off used to introduce the piano solo (a literal repeat). The detail in the arrangement continues with a reversal of the piano and bass roles: The bass takes the "call" phrases, while piano and drums have the response. The phrase is played twice before a series of variations on the idea carry the listener into the bass improvisation.

Example 46. Return to tempo:



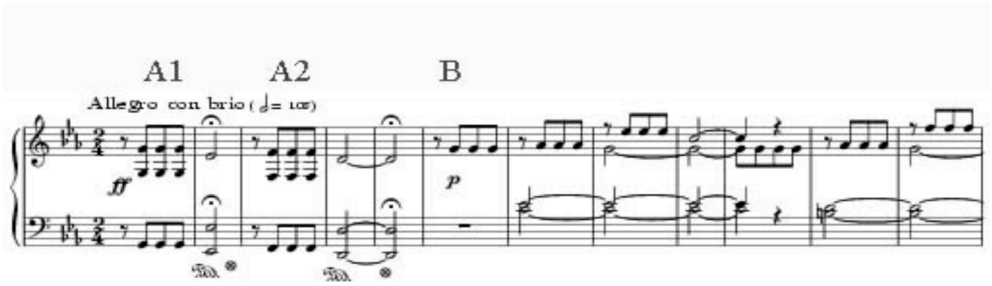
The call phrase in measure 61 itself is significant, as it serves as a basis for the improvisation that follows, in terms of construction and in terms of structure. The line features once again the chromatically ascending line seen at the end of the preceding chorus (measure 59), along with the combination of bebop chromaticism, left hand articulation, and a blue third. This phrase is repeated twice in measures 61-62 before we hear the consequent phrase in measures 63-64.

We can label these first 4 bars (and indeed also the first four bars of the piano improvisation, measures 25-28) as a AAB structured melody. In this case the letters A and B do not indicate full themes, nor are they simply motives.

The form the melodic cells that by their repetition will form the structure of the solo.

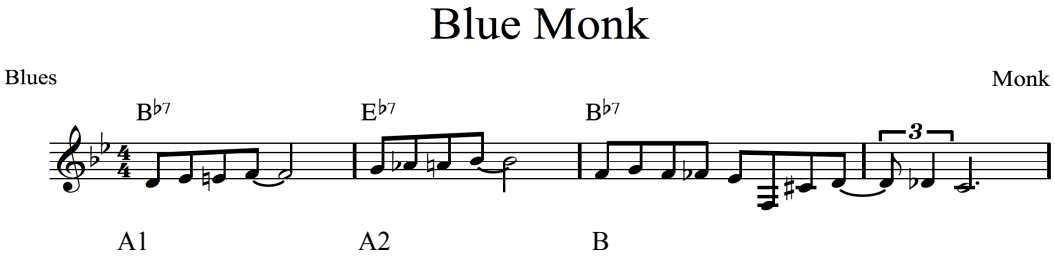
This AAB melodic form certainly predates jazz in European music (such as Beethoven's 5th Symphony) where we have a motive (A1), the motive repeated (A2) and then a concluding development statement exhibiting a variation. (B)

Example 47. Melodic phrase structure, Beethoven 5th Symphony:



This melodic schematic is in abundance in jazz music as well. Thelonious Monk's "Blue Monk" has a more concise version of this structured development:

Example 48. Melodic phrase structure, *Blue Monk*:



This simple structure offers an established method of at once making the listener aware of the composer's idea, and a logical method of developing the phrase. It is no surprise that many blues lyrics also follow an AAB format in many cases, although in a larger form. The traditional blues lyric takes a 12 bars to unfold:

Example 49. Lyric phrase structure,

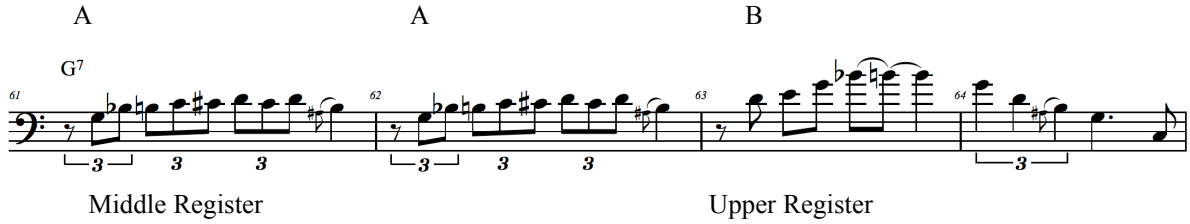
Lost Your Head Blues by Bessie Smith

(A)	I was with you, baby, when you didn't have a dime
(A)	I was with you, baby, when you didn't have a dime
(B)	Now since you got a lot of money, you have thrown a good gal down
(A)	Once ain't for always and two ain't for twice
(A)	Once ain't for always and two ain't for twice
(B)	When you get a good gal, you'd better treat her nice

The A-A-B structure represents a slight expansion of A-B. Just as the repeat in the exposition of a classical sonata form merely serves to enhance (but not alter) the essential A-B-A ternary form by repeating the Exposition (A-A-B-A), the repeat of the A phrase merely repeats the "call" portion of the lyric or melody and enhance the inevitable contrast of B (the response). We can refer to this phrasing as an expanded binary form, or as call and response, and it is ubiquitous in the bass solo.

Measures 61-62 establish the "call", while the longer "B" response phrase follows in measures 63-64. Each A is one bar, while B comprises two. The overall register shape is upward:

Example 50. Measures 61-64 call and response:

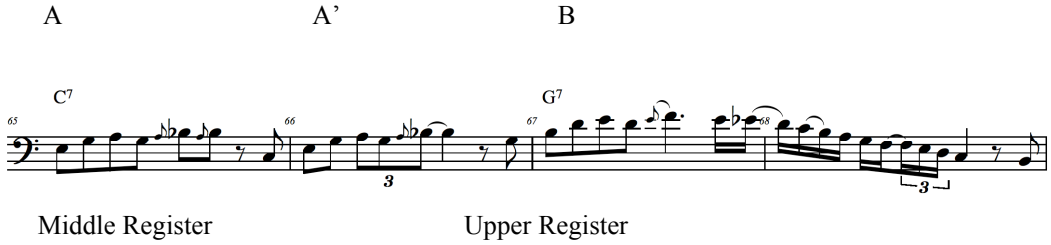


The response is in a higher range, thereby further establishing the conversational nature of the line by the distance in registers of the individual phrases. The A phrase is in the mid register, while B is in the thumb position (high register). The line also features the now familiar Bb to B natural slide in measure 63, then down an octave in measure 64. Harmonically Ray is very clearly outlining a G 6 chord (D-E-G-Bb-B) Ascending, and descending with an arpeggio, G-D-Bb-B G. It is more than a coincidence that these two bars can be played using only one shift of the left hand, another example of Ray Brown's use of economy on the bass.

II. Measures 61-64 Sequence

Measure 65 shows Ray using once again a harmonically simple device, some left hand vocalizations and an AAB model, although the second A phrase has a slight but compelling variance in the rhythm. Using a 1-3-5-6-b7 pattern, the A phrase is followed by a transposition of the same phrase up a perfect 5th over the G7 to its corresponding position, completing the sequence.

Example 51. Measures 65-67 sequence



The phrases in this section also follow the register shift exhibited in the first 4 bars of the chorus. We also see using the same left hand techniques discussed earlier in measure 63-64, but because of the change of the chord to a C7, the B natural is no longer a consonant option. The Bb-B motion has been replaced by A to Bb to reflect the new harmony. The min3 to maj3 transforms into 6-b7, and this new variant is transposed to the E and F of the G7 chord in measure 67, highlighted by the shift in register.

III. Measure 68, Erasure Phrase

Measure 68 shows the use of what Paul Bley later termed the "Erasure Phrase"[36] . Here we have a rapid 16th note flurry, and while the notes could be attributed to a G mixolydian scale, their primary purpose is to provide a momentary rhythmic contrast to the preceding phrase, essentially "erasing" the ear in order to make room for a new strong melodic figure. In just a few beats Ray has presents a phrase to contrast both the preceding and following melodies. This gesture makes his final phrases of the chorus stand out in contrast even further. Erasure phrases are not present in the less effective bass solo on the alternate take, where melodies of similar strength are played without this sonic separation. It is a subtle, but very powerful way of sharpening the listeners focus on the melodies themselves, as well as adding a layer of depth and variety.

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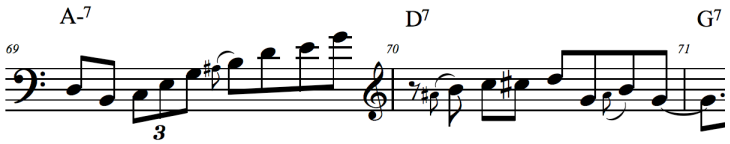
[36] While this technique had existed long before Pauly Bley, it has been accurately described by Norman Meehan in the book *Time Will Tell Conversations with Paul Bley* (Berkely Hills Books) "Bley repeatedly follows passages that are laregely tonal with phrases of densely packed notes that do not register any particular tonaly center, phrases that are more like 'sound gestures' than coherent melodies. Thes lines obscure the tonality and sometimes unsettle the time..." p54

IV. Turnaround

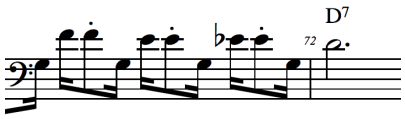
The turnaround of the chorus begins with an outline of a A minor 7th chord in measure 69, starting on the 3rd. This note is approached by a upper and lower neighbor tone, the smallest example of indirect resolution discussed earlier. This phrase shifts on the third beat and returns to the tonic sound with the B-D-E-G. In effect he has shortened the length of the turnaround and compressed it into two beats before prematurely resolving to the tonic. This resolution is extended through the next two bars however, by the octave displaced repeat of the ascending chromatic B-C-C#-D movement heard in the "call" figure back in measure 61.

Example 52. Measures 69-70 Arpeggio, tonic resolution, and restatement of "call" motive:



Measures 71 and 72 use an implied double time feel utilizing 16th notes to perhaps suggest that the solo will move into a more rhythmic and dexterous area for the following chorus, This turns out to be a ruse, as the 16th notes do not continue. They are however a prime example of Ray shifting the subdivision of the line from a swung 8th note to an immediate swung 16th without a break, producing a double time feel. The new rhythm contrast the earlier 8th note phrases, again setting up the return to 8th notes in the following chorus.

Example 52. Double time feel:



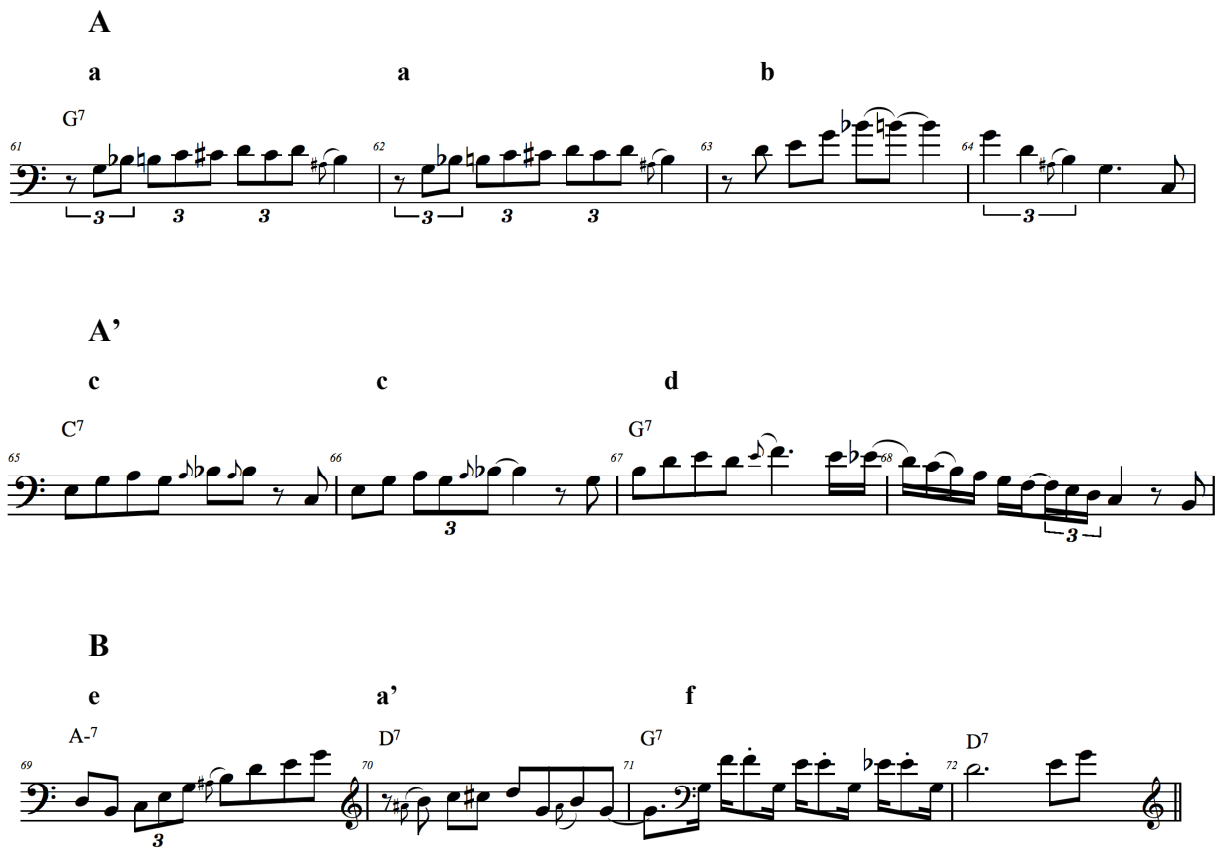
In another example of clarity, Ray leaves most of Bar 72 inactive while he holds the D natural. This lack of activity are a clear cue to the listener that another chorus is upcoming. Here the silence in unequivocal in its indication that this was a preliminary to the next section of the improvisation.

IV. Phrase Structure Measures 61-72

The final four bars of the chorus do not contain the obvious AAB structure that has been firmly established in the first 8 bars of the chorus. To the extent that it does not follow this scheme it can in itself be considered a

contrasting phrase structurally to the other two. These bars form what can be labeled a “B” phrase of sorts to the two “A"s that had come before While not as obvious as the repetition of Bessie Smiths lyrics, never the less we do have a background AAB expanded binary structure that encompasses the whole chorus, and will indeed for the following one as well.

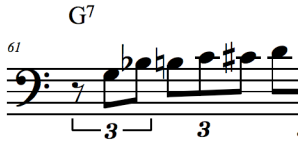
Example 53. Melodic Structure



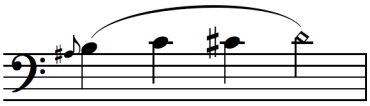
Measure 71 is also important because we have yet another chromatic approach to the D, the dominant, but again from the F above instead of the Bb below. It can be considered a linear mirror of the phrase used to start the solo. It is combined with the open G string in oblique motion, just as the open G served to start the first phrase. This is a case of book ending the solo with a phrase that is melodically inverted:

Example 54. Mirrored book ends:

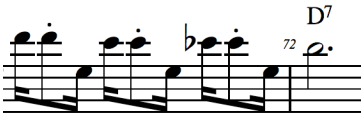
Measure 61:



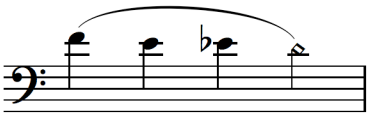
Measure 61 simplified:



Measure 71-72:



Measure 71-72 simplified:



The solo ends with a poignant D held for three beats, the longest note value in the chorus. Aside from establishing the tension that is built in to the dominant chord, we have a clear signal by the lack of activity and the held D that the solo is not over, and the half cadence leaves the chorus off with a question, and leaves tension as to whether or not this dominant will be resolved. It does, but not where we expect.

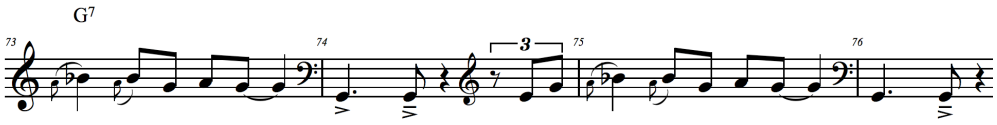
Chapter 9. Bass solo (part two)

I. Measures 73-76 Call and Response

The idea of call and response reaches its zenith in the second chorus, one of the most influential bass choruses of all time. It is interesting to note once again the alternate take, where this theme is repeated in the first 8 bars almost literally, obviously thought out ahead of time in design if not exact detail.

Once again we have an example of a mirror technique, in this case with the call and response itself as it relates to register. In the first chorus we had the answer to the first A phrase occur in a higher register, in the upper octave. In this case we have the answer to measure 73 in the *lower* octave, the G.

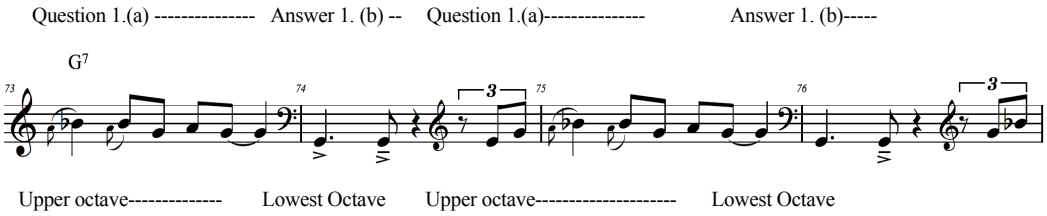
Example 55. Measures 73-76



Our low, prominent G that was missing until measure 60 G comes again in measure 74, and it is the answer to a blues scale phrase in the upper octave. The G is played twice (accented to increase the effect) and as a traditional charleston rhythm on beat one then the "and" of beat two.

The concept of dialogue is infused in this chorus. Phrases that flow from one to the next form a coherent passage and are unified by their antecedent / consequent relationship are also separated and contrasted by the distance in range. A dialog between two areas of the instrument answering each other's statements.

Example 56. Measures 73-76 dialog structure:

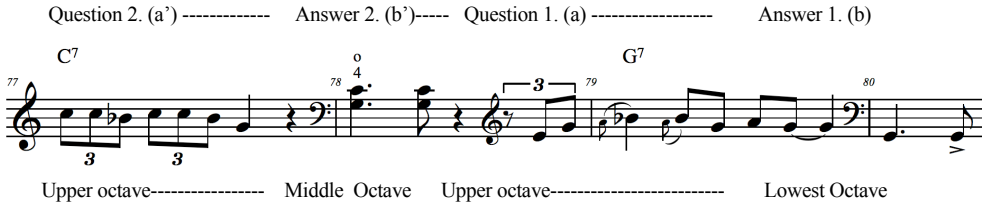


We see that it is the Bb this time that is emphasized, and not as a passing tone to the B natural. It exists as the primary melody note, and accompanied by it's own slide, from the A natural. The diatonic chord tone B natural yields to the Bb from the blues scale.

II. Measures 76-84 Dialog Structure

The next four bars have a similar schematic, but the inclusion of a second question and answer combined with the first. Because the theme is similar, we will label it **a',** and the answer **b'.**

Example 57. Measures 77-78 dialog structure:

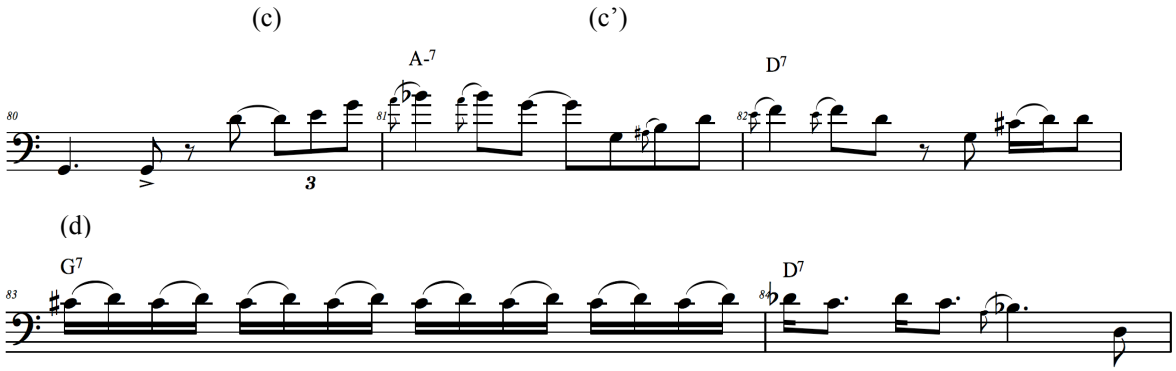


The question phrase is expanded up to the high C, and the answer is in the middle register, played as a double stop with the open G string. Question and Answer #1 return, creating a micro expanded ternary A-A-B-A structure. Melodically the phrases in the first 8 bars of this chorus could be described as blues scale melodies separated by a rhythmic riff on the roots of the chord changes. More important than the scale being used is this phrase structure and overt sense of dialog in the chorus.

III. Chorus Structure

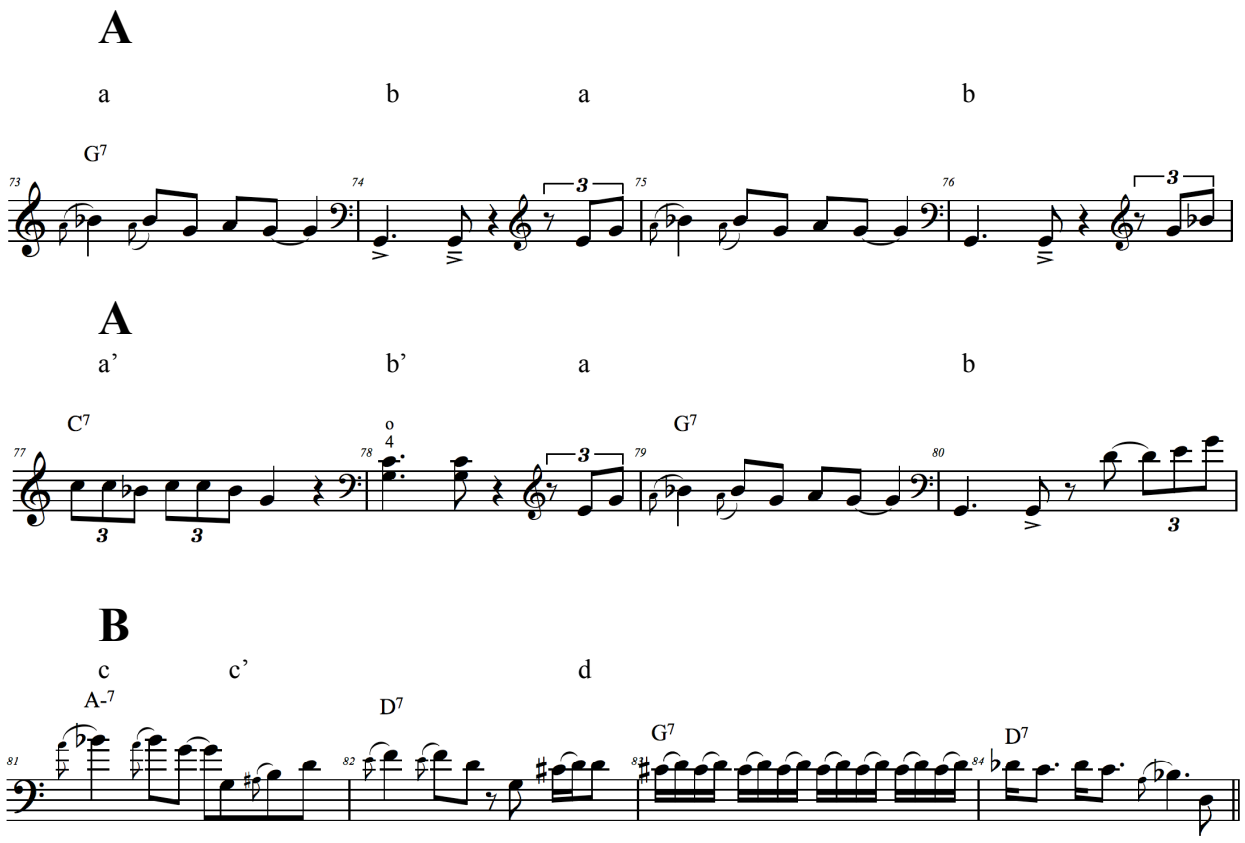
As the first 8 bars of this chorus has two 4 bar phrases that each follow the question - answer - question - answer model, the final 4 bar phrase is different. We again return to a longer melodic phrase that is different from the preceding 8 bars, and actually closer in construction to the AAB phrases in the first chorus:

Example 58. Measures 81-84 phrase structure:



As this phrase is contrasting to measures 73-80, we can label it as one longer "B". On a more macro level (looking at how each 4 bar phrase relates to the next) we again have a type of larger AAB (expanded binary) phrasing that once again follows the blues model provided above in the lyrics of Bessie Smith. The final structural analysis would look like example 59.

Example 59. Complete chorus melodic structure:



Through a larger outer structure we have unity between the two choruses in the architecture of an AAB form. The inner structures contrast between the two choruses, moving from aab in the first to abab in the second, each with an expanded phrase in the turnaround. Also of note is the book ending effect by the first shape of the solo (measures 61-64) being of the same shape as the last (81-84) in the form of aab (ccd).

There is further unity provided by the phrase Ray uses as "c" (as labeled above). Apart from the use of the sequence in measures 81-82 mirroring the sequence between measures 62 and 63, it is followed by a protracted trill on the D natural, the dominant. In the first chorus the D was held in the last bar for three beats, whereas here it is trilled for all of 83 and accented by the blues scale in 84. Analogous to a drum roll, Ray is setting up the reemergence of the piano solo and the full swinging ensemble.

IV. Summary of Bass Solo

The essential characteristics of this solo can be summed up in several essential points.

- Clearly defined phrases
- Varied phrase length
- Use of call and response
- Balance of bebop and blues vocabulary
- Clarity of harmonic intent
- Variety of registers and range
- Variety of rhythm
- Use of bass economy

These issues transcend the usual issues addressed in jazz improvisation which traditionally takes a primarily harmonic approach accompanied with the assimilation of transcription to incorporate what are essentially composition and arranging techniques to the improvised line. The track itself is an example of arranging and spontaneous composing on the micro as well as macro level. This art of impromptu arranging consists of having the technique, knowledge and taste needed to create these structures and variations in real time. As this track shows, a balance of premeditation and spontaneity result in an improvisation that combines the most sophisticated elements of both.

From here the piece dynamically rises, and we prepare to return to the bookmark left at the end of the fourth chorus, and the continuation of the piano solo.

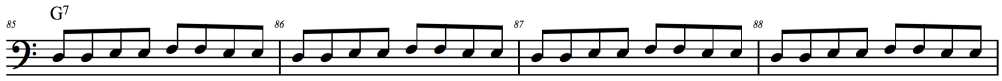
Chapter 10. Piano Solo (part two)

We have the reemergence of the piano solo, at first patient in its slow crescendo. The swing exhibited in the pulse is a stark contrast to the end of the bass solo, most notably in the drums. The ride cymbal reenters, and we have the feeling of four on the floor once again. In this chorus the first thing to consider is the piano left hand.

I. Bass and Piano Left Hand

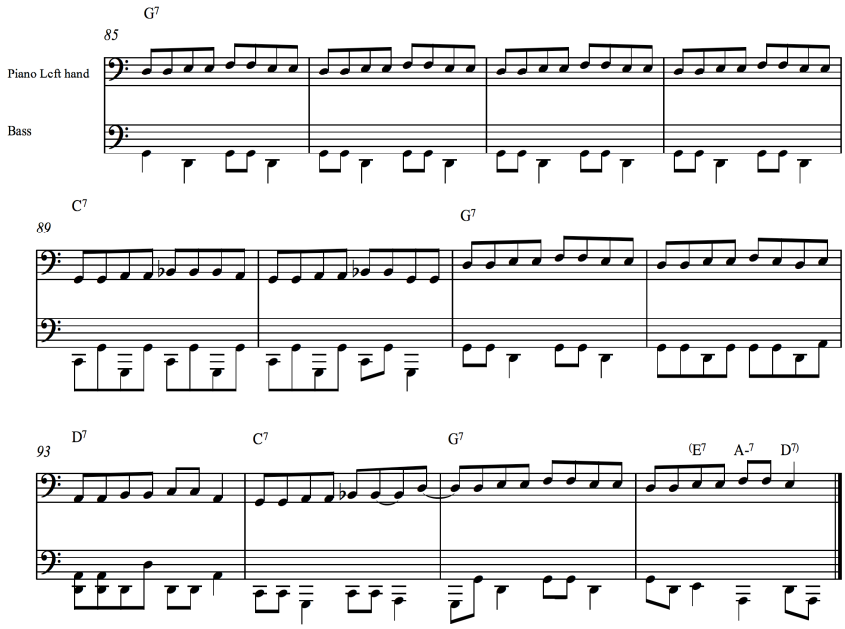
We have a traditional boogie woogie line, but with the roots of the chords omitted. Instead, a low register movement of the 5th to the 6th to the 7th:

Example 60. Piano left hand measures 85-88



The left hand is in the lower register of the piano, and as such offers the possibility of crossing voices with the bass and potentially becoming muddy or unclear. To avoid this clash and keep each voice independent yet conjoined, Ray uses what is essentially a pedal on the root, alternating with the fifth. It is essentially another expansion of the motive first heard in measure 3, the alternation of the upper and lower fifth of the chord. If we examine each of these parts together we see that they stay out of each other's way, and the pedal in the bass allows the piano left hand to move in oblique motion against the root of each chord.

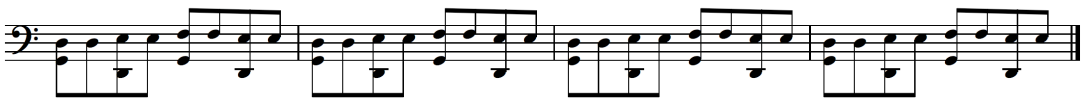
Example 61. Piano left hand and bass:[37]



If we were to write both lines together as one, we see exactly how cleanly these tow parts fit together to become one whole:

[37] The bass line in the next example is written without the usual transposition up the octave in order to show the exact octave relationship between the two parts.

Example 62. Piano left hand and bass



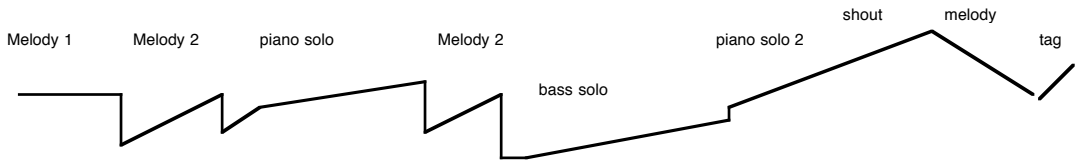
We also notice that the bass is not an exact duplication of the 8th note rhythm as the piano, or of the bass line in chorus number 5. The line is interspersed with quarter notes, and has the effect more a quarter note line embellished with 8ths, rather than an 8th note line embellished with quarters (as before in chorus 5). This despite the 8th notes occurring on the strong beats one and three of each bar. This gives the feeling of the 8ths but with the quarter notes necessary to begin the dramatic crescendo into the melody.

This line is the most scaled down bass line in the entire track. Consisting of little more than roots and fifths, we have the bare bones of the harmony. It is a line that is harmonically stark, rhythmically uniform, and dynamically restrained. In other words the perfect line of which to begin a dynamic crescendo that will last over the course of the next three and a half choruses. The crescendo that was in effect from the beginning of the piano solo that was interrupted by the interlude and then the bass solo is in effect once again.

II. Dynamic Shape

The entire piece up to this point has consisted in a series of terraced crescendos and decrescendos, indirectly making its way slowly upward. These crescendos are not just effected by volume, but also by texture.

Example 63. Dynamic contour of track:



After the bass solo there is a bump in the dynamic by the reentrance of the full trio, and we begin the slow burn to the climax. The constant push and pull of crescendo and decrescendo delay the inevitable peak, while at the same time anticipating it, and inevitably making it all the more effective by doing so.

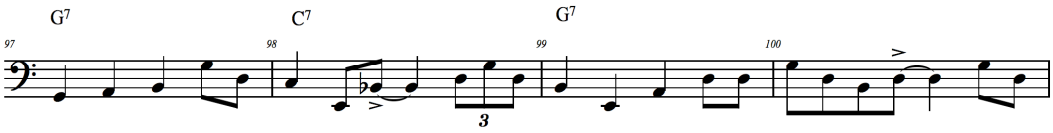
Chapter 11. Shout Chorus

The crescendo continues into the 9th chorus as the piano solo peaks and then yields to the ensemble shout figure. This shout consists of a call and response between a melody in the piano, followed by the full ensemble response in the form of a rhythmic hit occurring on the "and" of beat two every second bar. The bass line returns to a walking line, and indulges in the hits using various types of approaches.

I. Measures 97-100

The bass line begins with the recently introduced low G natural, making it's first appearance in the bass line as the root of the tonic G7 chord.

Example 64. Measures 97-100



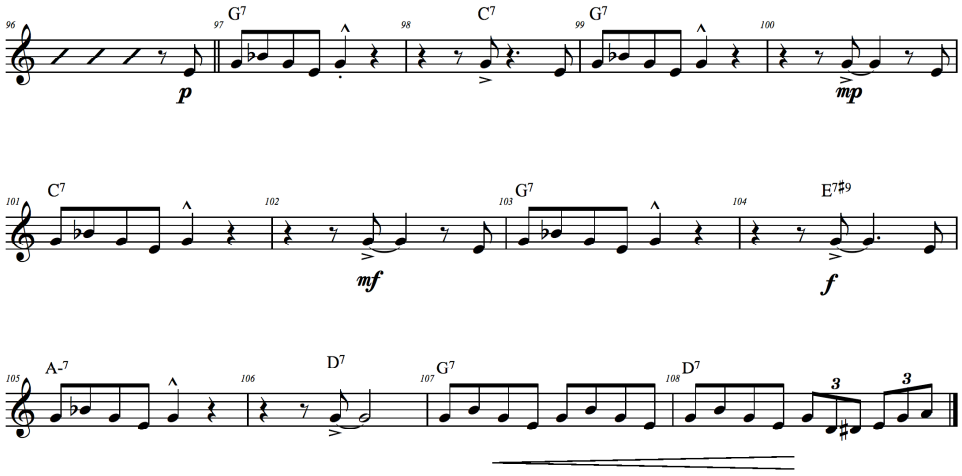
Indirect resolution is used again extensively, as Ray approaches the C in measure 98 obviously enough by the G - A - B, skipping up to the G in order to pass through the upper neighbor tone D on the way to resolving on the down beat C. After the low E, the 3rd of the C7 chord on beat 2, Ray chooses to use the Bb as the tone to emphasis on the upbeat of 2 with the ensemble shout figure. This note serves a few purposes.

II. Harmonization

First, this Bb is the b3 of the key, the blue third. It of course is also the b7 of the C7. For a syncopated figure (one that comes on the unexpected weak beat) Ray chooses a note which is also unexpected since it is not a primary bass note (root, 5th or 3rd), but a 7th of C7. It is also a passing tone, as we see the accented Bb resolve upward unexpectedly two beats later to the B natural in the next bar.[38] It also harmonizes the G that is the primary melody note of the piano shout figure, occurring on the "and" of beat two.

[38] The natural tendency of this Bb would be to continue downward to the G on the downbeat of measure 99 through an A natural on beat three.

Example 65. Piano shout figure:

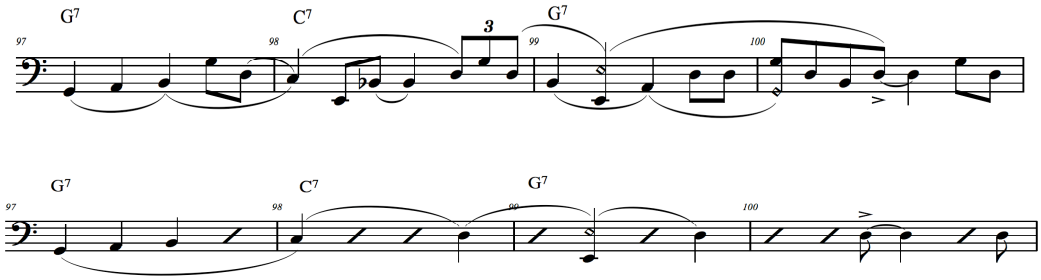


In each case Ray uses a note other than the melody note G to use on the rhythmic hit on the "and" of two. The second figure in measure 100 Ray harmonizes differently, playing the 5th of the chord underneath, the D natural. Here the riff is able to build in intensity not just through repetition, but also by the continuing variances underneath the riff in the form of harmonizing bass notes.

III. Indirect Resolution

Another important element of these four bars is the overall ascent of the line. If we remove the indirect resolutions, we can see an overall movement upward, form the G through to the E in measure 99, then settling back to the D:

Example 66. Indirect Resolutions measures 97-100

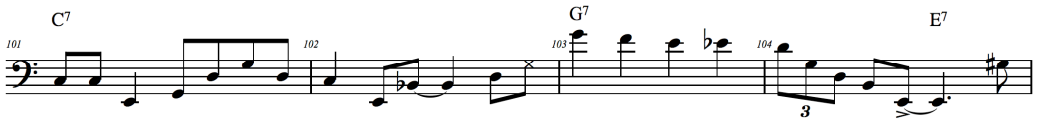


Here the E serves as a chord tone, but also as a neighbor to the accented D in measure 100. Aside from the linear

function of the notes in measure 99, we also see that Ray is using the circle of fifths, and is intimating a iii-vi-ii-V chord progression in measure 99 with the B-E-A-D movement. This is a further way of building tension through an implied harmonic movement underneath the static, riff based melody. While shout figure is building tension through repetition, the harmony in the bass is becoming more active, and more dense. When this is coupled with the rhythmic accents, and increased use of non symmetrical 8th note fills in the bass line, we can see that each layer of the music (rhythm, harmony, melody) are engaged in a building up of the tension.

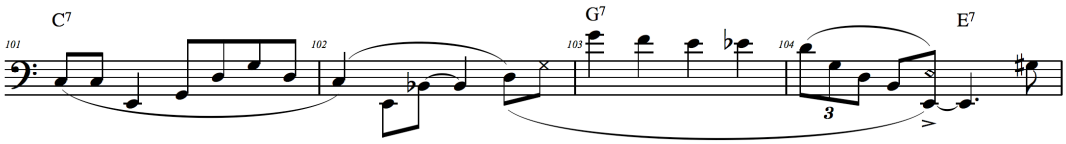
The next four bars are similar, but Ray uses a contrasting change of direction in the second half of the phrase:

Example 67. Measures 101-104



We can see that there are more 8th notes in this line, as Ray begins to thicken the rhythmic texture. Measure 102 is almost a literal repeat of measure 98, again emphasizing the Bb. But the rest of the phrase shows Rays grandest use of the indirect resolution yet. The C on the downbeat of 102 moves to the accented Bb, and then makes its way to the D on beat 4 of 102. The C-D movement will find its resolution in the E that is to come in measure 104, but only after a sweeping indirect resolution that will reach up to the high G natural in 103[39] . The G descends chromatically to the D. This will be followed by almost a two octave drop from the D down to the low E, accented with the riff in the piano and the drums. This drop is similar to the dramatic leap down to the E at the end of measure 8.

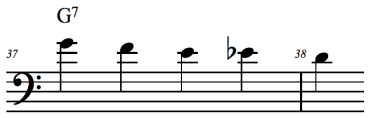
Example 68. Indirect resolution, measures 101-104



This phrase is also a brief reminder of the descending chromatic line that we saw in the 4th chorus of the tune, making a cameo appearance in the shout.

[39] Once again an open string, the D on beat 4 facilitates this large shift.

Example 69. Measure 37

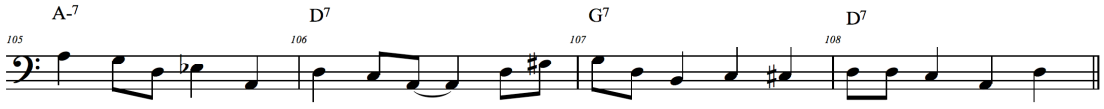


Measure 103 has our root-b7-6-b6-5 movement that was the beginning of that chorus, but here interrupted after 4 beats to make room for the thunderous triplet drop into the E. This moment is the climax of the bass line, combining the reoccurring 8th notes rhythms, accents, bebop chromaticism, rhythmic anticipation, and indirect resolutions that have made separate appearances throughout the work, combined and unified into one four bar phrase. It is a distilled lesson in the mastery of Browns craft evinced in the entire piece and given to the listener in a sublime moment in the history of rhythm section playing.

IV. Turnaround

While the piano will crescendo for another 4 bars building back to the head, Ray Takes a step back from building tension in the next four bars by returning to a line that would not have been out of place at the beginning of the piano solo, except for the rhythmic hits. Essentially a return to the patterns of the first chorus with the 8-7-5-8 pattern, followed by an almost literal repeat of measures 1-2.

Example 69. Measure 37



Chapter 12. Melody and Tag

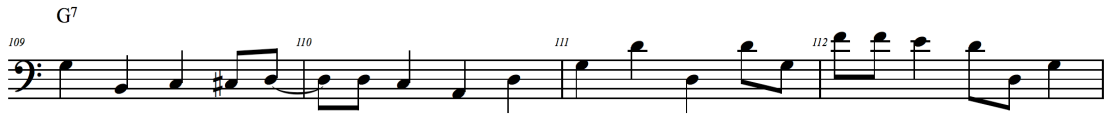
While Ray takes a step back dynamically in measures 105-108 in order to foreshadow the upcoming melody, the piano continues to crescendo through the phrase, culminating in the return of the melody on the “downbeat of measure 109.

I. Measures 109-112

It is interesting to note that this time the first note is not anticipated as it was at the beginning of the piece. This phrase is the peak dynamically of the track, before dropping back down for the statement of the theme. This phrase

is approached with an almost exact repetition of the bass line we heard in the first 4 measures.

Example 70. Measures 109-112 recapitulation:



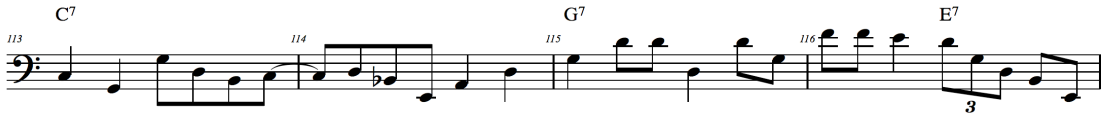
This line is also heard on the alternate take, we can take that as an indication that that portion of the melody may have been at least partially premeditated.

Once again we have the the linear line in measures 109-110 giving way to the open fifths in measure 111, and the bass counter melody in measure 112. It is clear that this is very close to a literal recapitulation of the melody.

II. Measures 113-116

The corresponding phrase to measures 5-8 is measures 113-116. While similar, there is a variation and increase in rhythmic activity along with the C7 chord, a development of the eight note idea that has been the rhythmic interloper in the bass line. This is once again followed by the same open fifth/countermelody heard at the beginning.

Example 71. Measure 113-116:



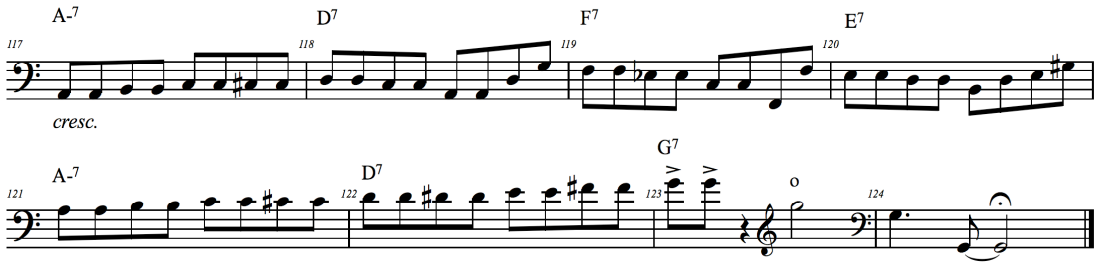
Once again we have the A to D on the third and fourth beats of measure 114. The most dramatic part of the phrase is the triplet figure at the end of measure 116. The triplet and 8th notes are in fact the same that we saw during the shout chorus, although this time it occurs on beat three instead of beat one. There is also an obvious parallel to measure 8, where a similar drop occurred.

III. The Tag

The melody out does not contain the second half of the melody (theme 2) that occurred in measures 13-24, and

instead moves to a tag of the theme 1, and one last dynamic crescendo. The trio drops dynamically even further as it approaches the turnaround and the preparation to make the last crescendo, this time uninterrupted from a piano to a strong forte. This crescendo is played with 8th notes exclusively in the bass.

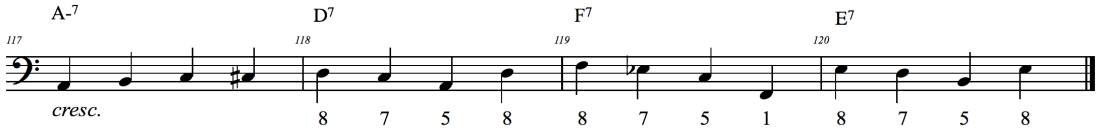
Example 72. Measure 117-124:



This final tag uses several of the techniques we saw in the fist two bars of the piece, but on a larger scale. First, the shuffle 8ths are used exclusively to create tension that parallels the dynamic crescendo.

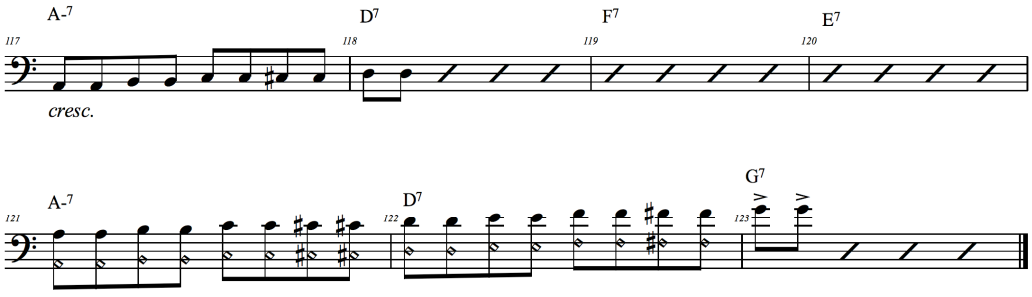
Second, we have extensive use of the 8-7-5-8 pattern. If we remove the repeated 8th notes we very clearly see a deliberate use of this pattern in 118, 119, and 120.

Example 73. Measure 117-120:



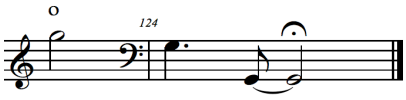
Third, we have the chromatic ascent to the A from the D this time, but once again passing through the B-C-C#-D found in measure one (this pattern occurs in measure 117 as well as 121). This pattern finally complete itself by continuing to ascend from the D all the way up to the high G in measure 122 by way of D-D#-E-F#-G:

Example 74. Completion of chromatic ascent:



The ascent reaches from the low A string all the way to the high G. The last two beats of measure 122 are also one last example of a double chromatic approach to the G in 123. Just The line reaches the high G, seemingly the top of the line, Ray utilizes the high G harmonic an octave even higher than that. This is the last phrase from theme 2, , a variation of the "blap, BLAP, **BLAP!"**[40] The three G's in the last bar descend by two, and then one octave. The high G plummets one last time to our final resting low G. We have arrived at the station, and the train comes to a halt.

Example 75. Final phrase:



[40] This is also the same rhythm as the classic Count Basie style tag.

Conclusions

At a 2003 concert in Richmond Virginia produced by the International Society of Double Bassists, bassist John Clayton hosted a tribute to the recently deceased Ray Brown. The finale of the concert featured a dozen bassists, including Clayton, ISB President Barre Phillips, Paul Ellison, Kristin Korb, and Lynn Seaton amongst others. The material was appropriately enough a blues in G, one of Ray Brown's trade marks. As inspiring as the performance was, it was also a demonstration from each of the soloists (including Mr. Ellison, renowned for his knowledge of orchestral and solo repertoire, but also a fine improviser) of Ray Brown's concepts and language, as an influence on some of the great individualists on the instrument. Each in turn interpreted and referenced some element of Ray's style on display in this 1962 during the recording of Night Train, albeit with some vastly individual interpretations.

There is so much to a solo such as this besides "licks". The depth of musicality contained is a subject often understood by advanced musicians, but rarely spoken of in detail. A survey such as this aims to illuminate some of the greatness of the performance, and aid in the development of future generations who are able to build on the profound mastery of improvisation and accompaniment.

As an influence, Ray transcended influence by being such a seminal figure in the history of Jazz bass. A comparison can be made to improvising trumpeters, forced to assimilate the innovations of Louis Armstrong because they encompass the very fabric of the trumpet[41] vocabulary, technique, and language of jazz itself. So too are bassists destined to walk in the footsteps of Ray Brown. His contributions helped establish the modern ideas of sound, time, vocabulary, and technique for the jazz bassist. Each of these items is on prominent display during *Night Train*, the result of an already immense wealth of knowledge, experience and taste that he had accumulated by 1962. The reach and influence of Ray's playing from this period has long since passed the ability to be tracked or measured, and is an epitaph to a giant that is proportionate to the genius he displayed. The study of which should help all aspiring bassists become their own "walking sound".

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