

# **ORCHESTRA SPEAK for the CHURCH MUSICIAN**

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by

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## **I. Introduction:**

**A. Choirs and orchestras: natural collaborators!**

**B. Much common ground**

**C. Some important differences**

## **II. The Basics:**

### **A. Suggested Balances**

1. Balances are dependent on many things (the hall/sanctuary in which the performance takes place, the strength of the players, the maturity of the singers, the repertoire chosen, the budget etc.)
2. Using doubled winds is not something I recommend, though others feel differently.
3. Regardless of the instrument, one on a part is always preferable to **2 on a part**, which **will usually guarantee intonation problems and poor blend.**
4. In terms of string section balances, I recommend equal or just slightly less second violins than 1sts, a viola section of approximately  $\frac{2}{3}$  the number of second violins, a cello section approximately  $\frac{3}{4}$  the size of the viola section and a bass section approximately  $\frac{1}{2}$  the size of the cello section. However, it is usually preferable (but not a requirement) to have multiples of two in each string section so each player has a stand partner.
5. Interestingly enough, one on a part for strings usually works acceptably in many cases, given excellent and secure players. This is simplistic, as the physics of this are very complex, but as a rule of thumb it takes 10 violins to double the sound of one; 100 violins to double the sound of 10. However, counter intuitively, if sustained and genuinely soft playing is required, more players are needed for softness, not loudness!
6. Using at least 6 string players on a part can ensure that divisi parts are covered by more than 2 players, and page turns will not be a problem.

7. When wind sections are needed, a critical mass of string players are needed, also. Generally at least 30 strings are required for a classical orchestra (2222 – 2200 – timp – str [8-8-6-6-3]) and 50 or more for a full orchestra. that includes low brass (usually in 19th century music forward). Unification of sound is what is important, not just the number of players, however!

8. Below are some possibilities, give or take a few players or a few singers.

- a. String Ensemble with Chamber Chorale (16-24 voices)  
Recommended: 1-1-1-1-1
- b. String Ensemble with Small Choir (25-50 voices)  
Recommended: 4-4-3-3-1  
Acceptable: 1-1-1-1-1  
Unacceptable: 2-2-2-2-1
- c. String Ensemble with Choir (51-99 voices)  
Recommended: 6-6-4-4-1  
Acceptable: 1-1-1-1-1
- d. String Ensemble with Large Choir (100 voices)  
Recommended: 8-8-6-6-3  
(Increase string ensemble by approx. 40% every additional 100 singers i.e. 12-10-8-8-4 for 200 singers)
- e. Chamber Orchestra with Choir (100 voices)  
Recommended: 2222-2200-timp.(+1)-(8-8-6-6-3)
- 6. Full Orchestra with Large Choir (200 voices)  
\*3\*3\*3\*3-4331-timp.+4-(16-14-10-8-4)

### B. Ordering music:

1. Universal numerical short-cut for parts: wws-brass-perc.-other-str  
in score order: Fls/obs/cls/bsns - horns/trps/trbns/tuba - timp.+ perc. - harp,pf,cel - str  
3[1.2. 3/pic] 3[1.2.Eh] 3[1.2.3/Eb] 3[1.2.Cbn] 4 3 3 1–Timp+4 –Pno/cel-  
hp-str[12-12-8-8=4]

2. A set includes one of everything, including one of each string part

3. A total string count will be requested (vln.1-vln.2-vla-cello-bass)

4. If a set is \$375 and extra string parts =\$3.50 w/total string count of 8-8-7-7-4 then the bill (minus shipping and handling) will be:  
\$375 + \$101.50 (29 extra strings times \$3.50) for a total of \$476.50

### C. Seating the Ensemble

1. In general terms, treble instruments sit to conductor's left, bass instruments to conductor's right.

2. Generally for balance considerations, strings play closest to the audience; winds in the middle of the ensemble and brass in the back.

Timpani usually are placed on the right side as they are usually part of the bass response. The other percussion are usually placed on the left side, as are the harp(s) (behind the violin sections). If a piano is used, it can be placed where it is more appropriate acoustically. If it must project, put it on the left side. The celesta can be placed on either side-if used with the piano, it must be placed with the piano-on the outside of the piano closest to the audience.

3. The wind and brass principal players should be arranged as close as possible to an imaginary straight line exactly in front of the conductor, with other parts radiating out from the center. In other words, right in the middle of the ensemble there will be a “box” of principal players-in the first row from the conductor’s left will sit the piccolo, 2<sup>nd</sup> flute, 1<sup>st</sup> flute, 1<sup>st</sup> oboe, 2<sup>nd</sup> oboe, and English horn. The second row of woodwinds will be, again from the conductor’s left will be bass clarinet, 2<sup>nd</sup> clarinet, 1<sup>st</sup> clarinet, 1<sup>st</sup> bassoon, 2<sup>nd</sup> bassoon and contrabassoon. Behind the woodwinds will usually be one row of brass. From the conductor’s left will be the 4<sup>th</sup> horn, 3<sup>rd</sup> horn, 2<sup>nd</sup> horn, 1<sup>st</sup> horn, 1<sup>st</sup> trumpet, 2<sup>nd</sup> trumpet, 3<sup>rd</sup> trumpet, 1<sup>st</sup> trombone, 2<sup>nd</sup> trombone, bass trombone (or 3<sup>rd</sup>), tuba. Seating the wind and brass section this way is optimal for the principal players to hear each other for intonation and ensemble.

4. In seating the string section, projection is the most important factor. The shoulder strings (violin and viola) are extremely directional in projection. Therefore the violins are normally placed to the conductor’s left, so that the *f* holes face the audience. The disadvantage of placing both violin sections to the left however is that it tends to merge the sound of the two parts. In some style periods, especially those where counterpoint is paramount, placing the 2<sup>nd</sup> violin section to the conductor’s right creates a more “stereophonic” texture. However, in that seating arrangement, using more 2nds than 1<sup>st</sup> is critical to offset the directional advantage enjoyed by the 1<sup>st</sup> violins. Normally, the viola section sits to the right of the conductor on the inside position to retain as much directional advantage as possible. That places the cello section to the conductor’s immediate right, with the basses behind them, which helps in pitch and ensemble of both sections, as both frequently play the same part, albeit separated by an octave.

5. While there can be slight alterations to this basic plan, generally this is most advantageous to grouping instruments together who play together. For instance, to the conductor’s right side are the celli, basses, bassoons, timpani and low brass. To his/her left are the violins, flutes, clarinets and horns. Generally the principle of placing instruments who play together close to each other should apply even in smaller group arrangements. For instance, in Baroque pieces the trumpets should always sit next to the timpani player since they almost always play in concert with each other.

### **III. Basic Orchestral Fundamentals:**

**A. Basic Differences** in working with string and full orchestras.

**B. Positions of performance responsibility** basic to all orchestras:

1. Concertmaster
2. Principal strings
3. Principal winds
4. Principal brass
5. Principal percussion

**C. Tuning**

1. Procedure
2. Pitch Standard
3. While playing
4. Between pieces

**D. Etiquette or standard protocols**

1. Seating
2. “Looking”
3. Appreciation
4. Grievances
5. Standard rehearsal courtesies
6. Rehearsal order
7. Published or posted “call sheet”

**E. Working with Professionals**

1. Do’s and Don’ts
2. Working with a union or “contracted” orchestra.
  - a. Contractors fee
  - b. Principal pay
  - c. Section pay
  - d. Breaks
  - e. Minimums
  - f. Score requirements
  - g. Parts to players at least two weeks prior to first rehearsal
  - h. Notification deadlines:
    1. Change of rehearsal order
    2. Overtime
    3. Cancellation or change of date
  - i. Call Sheet

**3. Positions of organizational responsibility in professional orchestras:**

- a. Orchestra Committee
- b. Time keeper
- c. Personnel manager
- d. Librarian
- e. Manager
- f. Stage Manager
- g. Executive Director

**IV. The String Basics:**

**A. Basic Nomenclature:**

**1. Know these Instrument parts:** the bridge, the fingerboard, the scroll

**2. Know these parts of the Bow:** the frog, the tip or point, the balance point, the lower half (LH), the middle (M), the upper half (UH)

**3. Open Strings:**

- a. Violin: In 5ths: G D A E
- b. Viola: In 5ths, a fifth below the violin: C G D A
- c. Cello: In 5ths, an octave below viola: C G D A
- d. Contra Bass: In 4ths, sounds 8va below written notes: E A D G

**B. Basic String Tone Production: Speed \* Weight = Tone  
(Moderated by sound point and other factors)**

**1. Speed of the bow:** Simplistically stated, the faster the bow is moved on the string, independent of weight considerations, the louder the dynamic created. Inversely, a slow moving bow, again without any weight implications, will be more subdued.

However, the range of acceptable speeds is relatively limited. Too fast a speed creates a distorted sound; at even faster speeds, one that is totally unfocused and “glassy”. There is also a minimum speed required for the bow to “settle” into the string absent any weight applied to it.

**2. Weight:** Because the formula for string tone can be simplistically stated as weight x speed = tone, it is easy to see that these two factors intertwine inversely. That is, the bow must be moved slowly to sustain weight, more quickly propelled if little weight is applied.

**3. Sound point:** Further more, speed and weight are influenced by where the hair of the bow meets the string relative to the bridge or the

fingerboard. This may be anywhere from on the bridge to completely over the fingerboard. This point is referred to as the *sound point*.

If a slow speed is used with a significant amount of weight, the sound point must be very close to the bridge, or the sound will be ugly and extremely forced. The string simply needs the support provided by the bridge to sustain the weight applied. This kind of playing will yield a very dark, focused sound. Inversely, using a fast, light bow with a sound point near or even on the fingerboard (*sul tasto*), will produce a transparent sound.

This effect is amplified in the higher pitched instruments. On these “shoulder” instruments, this effect is so important that pedagogues discuss “lanes” of sound points in the normal playing surface. Some have written of eleven such applicable lanes on the violin. In many ways, the sound point is most critical for the viola, due to the compromise of string length to pitch found in the viola. When playing on the lowest string of the instrument, the C string, it is very important for violists to remind themselves constantly to “pull in”, to produce a clear and focused sound.

**4. Another factor, the selected string:** Each string on an instrument also has a unique color or “voice”. Generally, on each instrument, lower strings are richer, higher strings more brilliant and penetrating. Except for passages falling in the extremes of the range, most passages may be fairly easily performed on either of two adjacent strings. In making choices as to which string to use, color preferences come into play, either at the discretion of the player, by written direction of the composer (using *Sul G* or *Sul IV* or similar type instructions), or at the request of the conductor. It is always appropriate for a conductor to make such a request, or to inquire of the players if it is feasible to play a passage on a lower (or higher) string. It is also desirable, when possible, to maintain one color throughout a given passage by shifting up and down on one string, rather than crossing strings which, although certainly easier, loses the consistency of color.

To summarize, playing passages in higher positions on lower strings provides a richer, more passionate quality; passages played in lower positions on higher strings are more resonate, brilliant and penetrating. This is a factor that is very important in style. Earlier styles are usually played on lower positions (higher strings), which reflect the objectivity of these styles and the fact that the performing techniques were generally not as developed then.

**C. Basic Bow Strokes:** The **Chart of Common Orchestral Bowings** (Appended in **Bowing Guide for Conducting Students**) reflects that some strokes:

1. are connected (legato), others are separated
2. have articulated initiations, others are completely unaccented
3. are always completely **ON** the string, while others do come **OFF**, either as carried strokes by the player or natural (uncontrolled strokes) bouncing of the bow.

**Some Basic Bow Strokes** (Appended) is a compilation of how the basic strokes are performed, and is included for your information.  
Prepared by Dr. Bruce Berg (Professor of Violin, Baylor University)

#### **D. Introduction to Bowing Theory:**

This is only a tiny introduction to bowings. For a more complete discussion, please see **Bowing Guide for Conducting Students**.

##### **1. Why are bowings so important?**

It is safe to say that there is no other single element that will affect the sound and ensemble, literally the performance, of an orchestra to a greater degree than the bowings of the string section.

##### **2. What physical realities determine bowings?**

1. The bow is held on one end, not both ends, or in the middle!
2. Because of #1., the direction the bow is going is the basis for natural musicality of the string section, and also for the effortless performance of many defining musical gestures
3. There are only two directions that the bow can go; the time and space going one way must be balanced by the time and space going the other way!

##### **3. What are the rules for effective bowing?**

See Chapter 3 in **Bowing Guide for Conducting Students**

#### **E. Creating and Marking Bowings:**

See Chapter 4 in **Bowing Guide for Conducting Students**

#### **F. Disseminating Parts:**

See Chapter 1 in **Bowing Guide for Conducting Students**

#### **G. Adjusting the Sound of the String Section:**

1. **Change physical balances**
2. **Adjust seating arrangements of sections**

- 3. Change color, dynamics or flow of the phrases by:**
- a. adjust speed, weight and sound points of string section.
  - b. request or change fingerings to select alternate strings.
  - c. request change of hair “tilt”.
  - d. adjust bowings including asking for off or on the string changes

**H. Basic String section techniques:** Specifics that you must insist on:

1. Players must start every passage **on** the string, always! (They will probably resist this!) Not doing so leads to very poor ensemble and equally bad- the “throwing of the bows onto the string.”
2. Players must always prepare their left hands.
3. They must pre-initiate vibrato, and then use it with all fingers, continuously.
4. They must usually avoid high open strings, especially violin e, except when it is indicated as an effect by the composer.
5. Individual sections as well as the whole string section must work to develop uniformity of bow use (upper, middle, lower, etc.) for blend, balance and similarity of articulations. This involves watching principals, as well as the conductor.
6. String players must play pizzicato as a musical sound! Pizzicato presents many problems. It is frequently played in an ugly fashion, even by very good orchestras. Experiment with different sonorities by having the players play it on different spots on the string, and with different parts of the finger. Insist that the players use vibrato with it. There is also an inherent balance problem of which conductors must be aware, for the lower string pizzicato is much louder and rings much more freely than does the upper string pizzicato. The biggest problem occurs with ensemble, as pizzicato is the fastest responding sound in the entire orchestra! Players must watch the conductor, and their principals. Tell them “Don’t be the first to play the pizzicato!”

**The following in points I and J are applicable when working with young, inexperienced or volunteer string players)**

**I. Basic Right Hand Fundamentals:** All string players need individual instruction to develop and refine their bow hold and bow arm. A competent player plays with firm, but very flexible fingers that provide refinement and control in all parts of the bow, has an inaudible bow change, and can play with a variety of bow speeds, colors, and sounds in a wide dynamic range. These certainly can not be taught from the podium, but the musical results



of any inadequacies should be mentioned. However, there are some common bow problems that can be addressed from the podium:

1. Rigid, inflexible fingers on the bow, which contribute to lack of control, “jerky” bow changes, and a general lack of refinement including an inability to start any bow gently. Conductors should remind young players of the cushioning or “shock absorber” function of the fingers.
2. Playing “out of balance” so that the natural “springs and weights” of the right hand and arm don’t permit the bow to function correctly.
3. Not using approximately straight bows. If the bow is “wandering” all over (constantly changing “lanes” without musical reasons), then the sound cannot be good. Remind players to visually check that they are keeping the bow “on one spot” constantly throughout their bow stroke, unless the music demands some change.
4. Using too much bow, especially for little notes. This will create too much sound, a “tubbiness” in the string section sound and will make the players play late to the ensemble.
5. Not using enough bow. This will create a very anemic-or thin sound, without a “core”. In a full orchestra setting, string players must really “work” to balance the winds, brass and percussion in loud dynamic passages. When they do, the sound of the tutti changes, becoming more resonant and “sparkling”, less strident.
6. Playing unwanted bow accents. These occur when players *recover* bow that they need to play the next passage without “*feathering*”, or turning the bow over to use the side of the hair with very little weight on the bow. Sometimes they need to be reminded to save bow before such a spot, so that they don’t have to recover so much bow length. Sometimes these unmusical accents are just the result of poor bowings, which need to be changed.

**J. Basic Left Hand Fundamentals:** These require the same kind of attention from a qualified specialist that the bow hand and tight arm require. However, again without providing string lessons from the podium, problems of the left hand that can be pointed out (and in some cases, corrected) include:

1. intonation
2. speed, width and intensity of vibrato as necessitated by style, musical phrasing and color.

3. poor facility. Usually facility problems are caused by incorrect postures or faulty fingerings. Basic position problems certainly need to be handled by private or specialist teachers. However, there is one common problem that can be addressed from the podium. This is the frequent habit of young players of playing with their fingers raised too far from the strings. This “flapping fingers” syndrome, slows down the response time significantly and makes it much more difficult to play in tune. Simply remind the players to “keep your fingers close to the string!”

4. With less experienced players, the conductor should also request that the principal players offer fingering suggestions for difficult spots. Often, a good fingering will solve many problems

## **V. Preparing the Rehearsal Plan**

1. Goals for each rehearsal
2. Everyone active within 5 minutes
3. In thirds: Building Time / Review Time / Performing Time
4. Allow 2-3 times the performance time for rehearsal time
5. Have backup strategies for difficult spots
6. Balance between technical and musical challenges in rehearsals
7. Post rehearsal schedule well in advance

## **VI. At the Rehearsal:**

### **A. String Sectionals**

1. Hierarchy of goals
  - a. Pitch and rhythm
  - b. Bowings and articulations
  - c. Tempo
  - d. **MUSIC**
2. Establish uniformity of bow applications
  - a. Bowings
  - b. Off-On
  - c. Parts of the bow
  - d. Sound points, weight, speed
3. Develop good orchestral string habits:
  - a. Sight lines with conductor and principal
  - b. Awareness of section ensemble

- c. Awareness of balance and color within section
  - d. Awareness of uniformity in bow use
  - e. Start On- No “throwing” of bows
4. When necessary with young orchestras, make parts more playable without threatening the integrity of the music. Try:
    - a. Octave transpositions (inside 1sts down octave reinforce loco outside players and 2nd violins, octave playing in 2nds reinforces violas, etc.)
    - b. add "missing" notes or rhythms in patterns.
    - c. break up longer bowings for sound or facility (for example- difficult string crossings)
    - d. Write in divisi parts that break up difficult spots into two more manageable parts.
  5. If rehearsal difficulties are encountered, especially with younger groups, try the following:
    - a. rehearse considerably under tempo, gradually working towards desired tempo.
    - b. rehearse with all single notes, practicing only pitches and rhythms.
    - c. rehearse for bowings only by playing only on open strings difficult patterns or passages.
    - d. Have players sing! Strings must be able to sing their parts!
    - e. Occasionally rehearse with reversed seating.
    - f. Use stronger players to assist less experienced ones.
    - g. Sub-sectional rehearsals are essential.
    - h. Avoid monotony-rehearse standing, make them think about the music, they must know all other parts as well as their own.
    - i. Rehearse and drill "inner rhythms"

**B. Wind, Brass and Percussion Sectionals**

1. Intonation awareness (recognition of chord members, octaves, unisons, etc.
2. Establishing uniformity of articulations
3. Balance and Blend
4. Achieving orchestral sounds and colors

**C. Full Orchestra Rehearsals**

1. Perfect solely orchestral problems
2. Create awareness of listening

3. Plan rehearsal from largest to smallest instrumentation to accommodate players.
4. Foster an awareness of and sympathy for the choral parts and TEXT.

**D. Rehearsals with choir and orchestra**

1. Proportionally, allow more time for “performance time”, without promoting a “note and rhythm” syndrome.
2. Build a concept of a musical whole- not of a chorus and an orchestra; but of a work of art. Promote listening across the entire ensemble; equate breathed and bowed phrasings.
3. Develop ensemble’s sensitivity to each other, to ensemble and rhythm, to phrase structure, to balance and blend, to the conductor’s art, and most importantly, to the MUSIC.

**VII. “Psychological Conducting”:**

- A. Bow based baton hold
- B. “Bowling based” gestures
- C. Modeled gestures, modeled sound
- D. Baton speed = bow speed
- E. Pronation, supination, vertical resisted motions and suspended joint motions = weight response
- F. Planes of conducting = sound point adjustments
- G. “Life cues”- Breathing and movement responses
- H. Relaxation and Tension responses

**VIII. Appendix:**

- A. **Some Basic Bow Strokes**
- B. **Good Orchestra Habits (for young players)**

## SOME BASIC BOW STROKES

By Dr. Bruce Berg  
Professor of Violin, Baylor University

**Down Bow Position: (supination)** fingers curved, balancing the weight of the tip of the bow with the little finger.

**Up Bow Position: (pronation)** The position the fingers take if you move the bow hold to the very tip of the bow: lots of weight on the first and second finger, fingers almost straight.

### Détaché (not slurred)

1. Performed in the upper part of the bow
2. Place the bow on the string so your arm forms a right angle at the elbow—this is your “middle of the bow” position.
3. Fingers are in “up bow” position or the “inclined” position (pressure on first and second fingers).
4. The pressure is not released, and the bow strokes should be connected, not detached as the name of this stroke seems to indicate.
5. Make sure your elbow opens up freely.
6. To illustrate to the student the proper way to apply pressure (from the forearm only, and using a motion similar to turning a door knob), hold the tip of the student’s bow, and have him push you down to the string.
7. Common defects in playing détaché include
  - a. accenting then releasing the pressure
  - b. stopping between bow strokes
  - c. the bow slides towards the fingerboard on the down bow. To correct the "fingerboard slide" instruct the student to reach "out" on the down bow stroke, allowing the elbow to open like a hinge; and move the wrist "in" towards his nose on the up stroke. To ensure the student has a "free" elbow, have him move his forearm back and forth without the bow, then make the same type of motion with bow in hand.
  - d. The wrist collapses upon approaching the tip of the bow, causing a decrease in pressure. The release of pressure can be corrected by having the student play with only the thumb and first finger holding the bow.

### **Martelé (hammered)**

1. Performed in the upper part of the bow.
2. Teach up bow first (the hand is in up bow position).
3. Apply pressure with first and second fingers, and/or push upward against the bow with your thumb (pronate). Use #6 method from détaché, or imagine opening a can of sardines. You know that twisty type of lever!
4. Play with a very fast bow, but **immediately release** the pressure. Your hand should flip into down bow position upon releasing the pressure, if your fingers are loose.
5. Down bow is more difficult because the hand must be reset to up bow position, same procedure. Your hand should flip into down bow position upon releasing the pressure, if your fingers are loose.
6. The bow must be “set” before each bow stroke. In other words, pressure must be exerted on the string before executing the stroke, and preferably in a rhythm.
7. The 3 rules are:
  1. pressure
  2. release of pressure, combined with-
  3. fast bow speed.
- 8 This bow stroke should initially be practiced with big gaps between the notes in order to give time for setting the pressure, and with small amounts of bow.
9. In executing the fast martelé, the application of pressure coincides with a fast bow stroke, followed by an immediate release of pressure. (The wrist flicks.)
10. Martelé is like a bowed pizzicato.

### **Collé (“pinched” literally, glued)**

1. Initially taught on the string in the middle of the bow , then in the lower part of the bow.
2. The finger motion in up bow is virtually identical to picking up a soft, pliable object (such as a piece of cloth). However, on the violin, the motion is made very quickly.
3. Before an up bow collé the fingers should be in up bow position (the fingers are extended). The moment the bow touches the string ”pick up” the bow from the string so the fingers go into down bow position.

4. Before a down bow collé the fingers should be in down bow position. The moment the bow touches the string, shoot out your fingers to up bow position. (like throwing away the piece of cloth in No.2).

5. Because of the pressure exerted by the bow on the little finger, it is wise to initially practice this bow stroke holding the bow at the balance point.

### Spiccato

1. Performed in the middle to lower part of the bow.

2. The hand should be in down bow position.

3. On the down bow the bow is dropped onto the string, up bow the bow is lifted.

4. Initially the student should be instructed to swing his arm in a big, arc-like direction, rather like a pendulum. Start with big arcs and gradually make the arc smaller and smaller, which will increase the speed of the spiccato.

5. The action of the fingers is neither passive, nor too active. To demonstrate that the fingers merely respond to the bow's encounter with the string:

a. Have the student hold his bow vertically in the air. Then have him gently bump the bout of the violin against the bow. If the fingers are flexible and passive, the bow will rebound and fall back to the violin, and the fingers will remain passive.

b. Then have the student hold the violin so that the violin string can bump gently against the bow.

6. To demonstrate the active finger motion (Dounis exercise):

a. Hold a pencil in your hand in bowing position

b. push the pencil down with the first, then the 4th finger. Do not move the forearm.

c. Do the same with the bow in the hand.

d. Then drop the bow on the G string, down bow. On the rebound lift the bow upward: the tip of the bow drops. On the up bow, peck the bow on the E string. On the rebound lift the bow upward: the tip of the bow goes up. Use large figure eight motions to begin with, gradually decrease the motion.

e. Do the same as #4, but stay on the G string.

7. To demonstrate the amount of finger activity and achieve a feeling of control, have the student practice spiccato on the side of the violin (on the C bout).

8. If the student's wrist is too rigid or to achieve the feeling of a "weightless" bow have the student "cradle" the bow at the balance point, without the thumb. Then add the thumb and attempt the spiccato. The student should then move back to the normal playing position, recreating the same feeling in his hand. There will be more weight pushing against the little finger when holding the bow at the frog.

## GOOD ORCHESTRA HABITS

1. The first step: learning your own parts conscientiously!
  - a. Work out the difficult spots under tempo
  - b. Work on high spots down the octave until you are certain of the pitches
  - c. Get in the habit of COUNTING!
  - d. Always come to rehearsal with your own part prepared!
  - e. If necessary, listen to the pieces with good recordings.
2. Come to rehearsal 10 minutes early. Warm up carefully; spend any extra moments reminding yourself of difficult spots. Practice these softly and under tempo.
2. When you know your own parts, begin to listen in rehearsal to ascertain the **role** of your part at any given time: primary melodic, secondary melodic, accompanimental, background, etc. Deciding this will help you choose the correct dynamic, balance, color for each section of your part.
3. Begin immediately to listen to other parts. At the very least, you should always be able to hear one other part, preferably the melodic interest if you don't have it, as you play your part!
4. Always listen for motor rhythms, ostinato rhythms, etc. These provide a steady basis for ensemble in the group.
5. Listen carefully for complementary parts (sections in harmony with yours, countermelodies that "fill in" spots in the part you are playing, rhythmical accents that you can play off of, etc.)
6. Listen carefully for pitch. Never play so loud that you can't hear the rest of the group. Be certain your intonation is agreeing with the others within your section and with other sections.
7. Be certain you can see the conductor at all times! Position the stand so that you can see the music and the conductor in the same sight angle. Remember, if the conductor cannot see your eyes, then he or she knows that you can't possibly be watching!
8. Ask questions when you don't understand something. However, be certain you aren't the kind of musician who asks questions constantly to draw attention to themselves! If you hear something that isn't correct (in your opinion), bring it to the attention of the conductor in a respectful way. Preparing to bring a piece to performance level should be a collaborative effort for all involved.
9. Always have a good #2 pencil at rehearsal. (No colored lead or ink!)



10. Talking within the rehearsal should be limited to only questions or comments about the music.
11. Internalize the rhythms. Don't tap your foot! (Tapping toes inside shoes is acceptable!)
12. Gum and music don't mix!

**Especially for string players:**

1. Don't ever try to outplay your section. Play within yourself, and within your section. There are never "heroes" in a good string section.
2. Watch your section leader. Try to play in the same part of the bow, and use the same articulation and the same amount of bow that the section leader is using. Try and match the leader's bow speed and sound point. This way, if the conductor wants something else, then it becomes relatively easy to change what the section is doing.
3. The job of the section leader is to offer suggestions to his or her section. The comments should be offered in a sensitive, constructive, encouraging and positive way. These comments should be accepted in like manner.
4. If a section player has a suggestion, they should offer it to the section leader, but sensitively and with respect, and preferably in a private or one on one setting. If strong feelings are present, take the suggestions to the conductor to decide.
5. When wind players are playing, especially in solo passages, never turn to watch them. This is considered very rude in orchestras.
6. Always mark bowings carefully; fingerings are another matter. Consult with your stand partner to see what their feeling is on this subject. One person's fingerings don't always work for the others! You may wish to work out a system of putting one set of fingerings above the line, another below it when fingerings are absolutely needed.
7. Always sit up in the chair. Not only does poor posture seem to indicate a poor attitude, it is not advantageous for good playing.
8. Even for off the string spots, start **ON** the string for good ensemble.