

## **THE USAGE OF THE BOW IN STRING TECHNIQUE: THE KEY TO A MUSICAL PERFORMANCE**

**Topics will include: proper bow holds, bow markings, bowing the parts, best tone production, bowing for dynamics, bowing for musicianship, and much, much more! All levels from beginning to advanced!**

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**Introduction:** The bow really is the heart and soul of a musical performance. So much attention and emphasis always seem to be placed on the left hand and intonation, and the bow sometimes receives less attention and focus when preparing for a performance. I feel it should be the opposite. Once a musician produces a nice tone with the bow, the left hand will want to improve intonation to complement the nice bow stroke. Think of a wind player that plays an incredible tone on a single note... the beautiful tone will naturally want to play in tune!!!!!!

### **THE BOW IS THE SAME AS THE AIR TO A WIND PLAYER OR VOCALIST**

Bow speed, Bow pressure, Bow tilt, and lanes, Pairing vibrato, Bow location, putting it all together

**KNOW AND UNDERSTAND THE PHYSICS OF THE BOW!!!! USE THIS KNOWLEDGE TO YOUR MUSICAL ADVANTAGE!**

### **BOW LOCATION: STROKES PLAN AHEAD LIKE THE GAME OF POOL**

Similar to playing pool—always planning for the next shot or stroke  
How to play soft.... Less bow really? Less pressure, less hair, closer to fingerboard

Video Ensemble – Turn of sound: do the bow motion/speed remain constant???

### **GENERAL BOW INFORMATION**

**What is a bow made of???** **Materials:** A higher quality bow will produce a better sound than a lower quality bow. Hear the difference!!!!!!

Purchase durability vs. budget they will last longer (CODA bows in my HS program lasted 20 plus years and counting)

Fiberglass/ Composite: least expensive, subject to splitting \$50+

Carbon Fiber: new material, very strong but varying quality and durability \$100- \$4000

Wood. Pernambuco: highest quality \$200- ????? Tourte Bow  
experience record price \$367,862 in Dec 2018

**Bow Sizes:** make sure you have the correct size

**How To Tell The Differences:** Violin (square frog), Viola (rounded frog)  
Cello (larger tip), German Bass, French Bass ( like cello), Sizes German  
or French???? Start with French is going from violin/viola, or cello.

**How tight is tight enough?** How tight should the bow be? Pencil,  
marker trick. Hair length may not be not correct if bow cannot be  
tightened do not keep tightening. Screw trick, squeeze to save screw

**Bow Hair Types:** synthetic vs. real (different grades on real horse hair—  
from the tail of Siberian, Mongolian horses Hair: synthetic, real.

Approximate number of hairs violin 150 hairs, viola 175, cello 175-200,  
bass: 200-250 as the number of hairs go up, the length of hair shortens.

**Caring for bows:** Always loosen until almost touching the stick... bow  
hair is only held in by pressure and a wood plug

Save the screw trick: squeeze frog while tightening and loosening

Wipe stick down each time, avoid touching bow hair

If you are holding bow correctly, there will be a bit of black dirt at the frog

Screw trick if bow will not tighten..... screw may be stripped

**When to re-hair or if to rehair** cost could be around \$60-over \$100

Rehair when rosin no longer shows underneath fingerboard or bow does  
not hold rosin or grip strings, hair becomes brittle and breaks often.

Rehair even if you have plenty of hair left... hair wears down!!!!!!

**Rosin:** dark or light???? Dark can give more bite, light less.

Cello/violin/viola rosin all the same. Bass rosin only for bass. How much  
to use???? Six strokes each day Bow without rosin.... Lack of rosin on  
an ensemble of 40 adds up! Always check rosin before each rehearsal  
and concert!!!

**PROPER BOW GRIPS: are proper bow grips really that important? Do you play golf??? Pickle ball? Sports???**

**Violin** (grab like a fist, then relax, pinky on top for balance, thumb bent outward (make a circle with thumb and middle finger – thumb vs. four fingers) make sure proper placement of thumb is partially on grip and partially on frog for best balance and results... thumb on outside of frog for beginners??

**Viola** (basically the same as violin)

**Cello** (wrist/hand is more vertical, all fingers, including the pinky, over the stick)

**French Bass** (basically same as cello)

**German Bass** ( give your dog some water in your hand)

**Rubber surgical tubing or bow grip aide**

**BOW MARKINGS: NAMES AND ON PAPER (see Bowing Info and Tips)**

**Legato:** smooth bow transitions

**Loure, Portato:** legato and separated all in one bow

**Detache:** change in bow.... Does not necessarily meant detached style

**Marcato:** strong accented short notes

**Martele:** strong accented notes similar to marcato but a bit longer

**Spiccato/Sautille:** off the string, bounced stroke (technique tip: uses the middle balance point of the bow)

**Staccato:** short press release, press, release, on the string

**Ricochet/Jete/Saltando:** at the tip of the bow, thrown down

**Sul Ponticello**

**Sul Tasto**

**Tremolo:** at the tip even for FF

**BOWING THE PARTS: GENERAL RULES (see Bowing Info and Tips)**

**Bow your own parts:** Don't the parts come bowed? Some will be completely bowed, somewhat bowed with a lot missing, not bowed at all. If they do come bowed, they use some general bowings that do not always fit what you needed. Some come with impossible bowings: that is probably a phrase marking, not a slur. You should bow your own parts: It is how you interpret the music.

**Do they need to match? Why?** Not just for appearance. Bowings can change the interpretation and phrasing of the music. Sharing of same melodic lines or accompaniment lines should share the same bowings. What about random bows? Free bowings? Breathing and bowings?  
**Feel free to always change the bowings**, but try not to change the style of music through the bowings.

**Bowings to implement dynamics:**

Know and understand the physics of the bow!!!! Use this knowledge to your advantage! OK to change speed of bow stroke... slower, less bow at the frog faster, more bow at the tip for an even sound.

SAVE the bow for dynamics and phrasing.

Bow fade at tip: Tip is lighter than the frog.... Use more bow and more pressure at the tip when performing a long bow stroke. Also, violin/viola at the tip is quite a stretch (due to longer fingerboards)

Softer: not just less bow..... more bow with less pressure, closer to fingerboard, tilt the bow to use less hair

**Pizzicato:** always an up bow before a pizzicato

**Frog is heavier than Tip.**

**Start measures down bow**

**Pickups:** up bow at the frog

**BEST TONE AND STRONGEST TONE TIPS**

**Bow lanes:** depends on string, depends on positions, bow tilt (violins vs. cellos) What sounds good on the lowest string does not sound best on the highest string. Closer to bridge, closer to fingerboard depends on the string AND the position

**Dynamics:** bow tilt, make sure it is flat, violin/viola different than cello/bass Producing Biggest tone possible: press down and crunch the sound, then relax slightly practice using only first finger and thumb other fingers for balance and support

**Violin/Viola:** at the tip it is a stretch! Why? Because fingerboard got longer. Straw trick. Cello/Basses: not just pressure, but "drag" the bow across the string

**Chords:** play closer to the fingerboard to cut the angle of the strings and thus produce a bigger and more vibrant sound!!!

### **PURCHASING A BOW FOR THE ADVANCED ENSMBLE/PLAYER**

Every arm is different. One bow may feel heavy in one arm, and light in another. One bow may be great for one, and bad for another.

Plan to spend at least around \$500- \$1500.

pernambuco or high quality carbon fiber

good music store will let you check out a few bows to tryout

when trying out bows, don't try too many at a time or they all start feeling the same. Usually your first instincts are correct. Also, have someone listen to you play the different bows for sound quality

### **REHEARSING FOR BOWING TECHNIQUE:**

**Warm-ups using the bow:** open strings for bow styles, scales, etc.




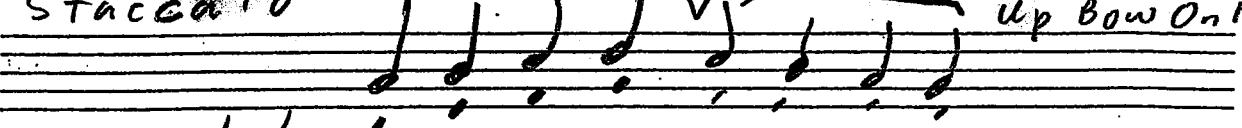
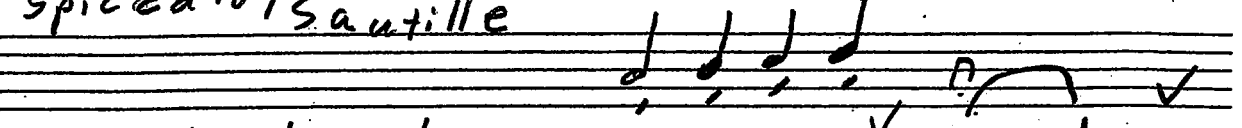
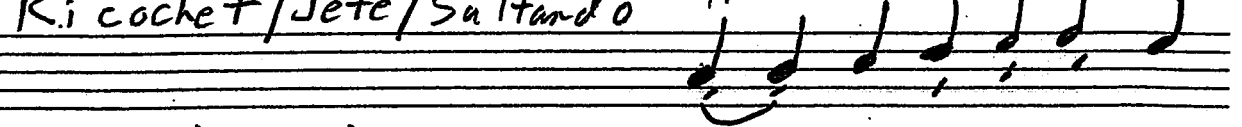
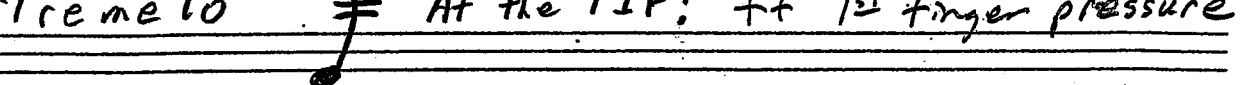
**Teaching music through rhythm on one note only (band also!):** wrong notes may not be wrong notes but wring rhythms. The right note, at the wrong time, is entirely the wrong note. The wrong note, at the right time, is at least rhythmically correct. Most of the time bad music comes from not the left hand but the timing of the bow stroke and rhythm.

Thank you Glasser Bows [glaserbows.com](http://glaserbows.com) and their representative Charlie Wolf (858) 229-2655 [all4strings@gmail.com](mailto:all4strings@gmail.com) for the generous use of their bows and materials for this hands-on session.

# "BOWING INFO + TIPS"

ALBERT JEUNG

## BOWINGS AND MARKINGS

- ① Legato / Detache 
- ② Loure / Portato 
- ③ Marcato / Martele 
- ④ Staccato 
- ⑤ Spiccato / Sautille 
- ⑥ Ricochet / Jete / Saltando 
- ⑦ Tremolo 

## BOWING THE PARTS Angle Pizz, to anchor or not?

- ① 
- ② 
- ③ 
- ④ 
- ⑤ 

⑥

⑦

⑧

⑨

⑩

**INTERPRETATION**

MARCH

BOUREE

POWER ENDING

BALLAD

SCHERZO

ANGRY, DARK

JOVI

# "BOWING THE PARTS"

ALBERT JEUNG

The musical score is written on seven staves in G major (one sharp) and common time. The notation includes various dynamics and performance instructions:

- Staff 1:** Starts with *pp*, followed by a crescendo to *f*, then a decrescendo to *pp*. Includes accents and slurs.
- Staff 2:** Starts with *f*, includes *Arco Pizz* markings, and ends with a decrescendo to *p*.
- Staff 3:** Starts with *p*, includes *trem* markings, and ends with a decrescendo to *mp*.
- Staff 4:** Starts with *ff*, includes *pp rit* markings, and ends with a decrescendo to *pp*. Includes a double bar line and the word *morendo*.
- Staff 5:** Starts with *mf*, includes triplets and accents.
- Staff 6:** Ends with a double bar line and *ff*.