

# All About Headjoints

by Sandy Schwoebel

**F**lute headjoints come in a wide variety of materials and colors. They are usually made from some type of metal, either gold, silver, auremite, stainless steel, or carbon fiber, the material used to coat the heat-shielding tiles on the space shuttle. Other headjoints are made from wood, plastic resin, or glass.

Although the body of a flute is cylindrical, (like a paper towel roll) the headjoint is conical (like an ice cream cone) which means that the tube becomes slightly narrower at the end. This keeps the high notes from sounding flat.

Many things contribute to how a headjoint sounds and responds, including the material from which it is made. In general denser materials such as silver or other types of metal will sound louder than wood. The shape of the embouchure hole also affects the sound. Most modern headjoints have holes that are shaped like a rectangle with rounded corners. In the past holes were shaped more like circles.

The wall of the blowhole from the top of the lip plate to the bottom inside the tube is called the chimney. The height of the chimney affects how difficult high and low notes are to play. Flute makers shape the edges of the chimney to let air move

faster through the tube. This makes changes between octaves and tone colors easier. The shape and angle of the lip plate also help to channel air into the flute to make it easier to play. On some flutes there are sculptured additions to the sides of the blowhole and lip plate. (They can be called wings, waves, semi-waves, butterflies, and aireeds.)

The end of the cork is set at exactly 17 millimeters from the center of the blowhole. If the

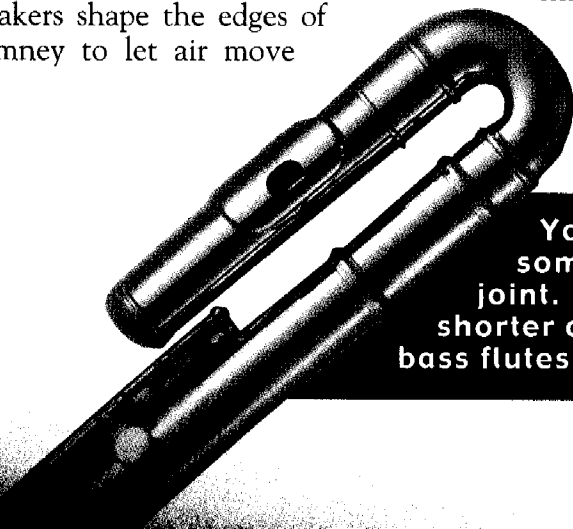
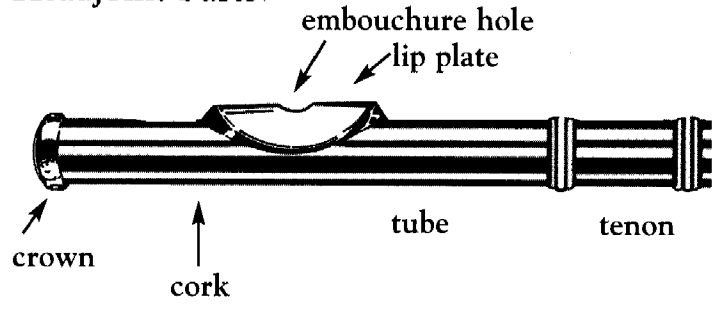
cork is off by even a little bit, it affects how well the flute is in tune. A cork that is too tight muffles the sound. A cork that is too loose allows the air to escape and produces a wispy

sound. The crown is a cap at the end of the headjoint. It is attached with a screw that goes into the cork.

## Headjoint Maintenance:

Most flutes come with a swab stick that is marked with a line near one end. Insert the line end in the headjoint up to the cork. Take care to position it in the center and look down at the embouchure hole with the headjoint horizontal in front of you. If the line is not exactly in the center of the hole, the cork should be adjusted. Before moving the cork, measure the distance to the line on

## Headjoint Parts:



Younger flutists with short arms sometimes use a U-shaped headjoint. The curve makes the instrument shorter and easier to hold. Long alto and bass flutes also have U-shaped headjoints.

# Headjoint Fun

You can create some interesting sounds by playing the headjoint alone. Practicing these sounds will improve your flute playing. Hold the headjoint alone, in the normal position to create a basic sound.



When you place the right palm over the end of the tube to close it, you can play three notes. Make sure to support the other side of the headjoint with the tip of the left index finger on the crown or cap because these notes are easiest to play when there is very little pressure of the flute against the lip. As the notes go higher, aim the air higher with the lips but without moving the head. A faster blowing speed works better.



The headjoint can also sound like a slide whistle. Play the headjoint while holding it normally. Then insert the index finger inside the open end of the headjoint. The sound will get lower the farther the finger slides in. With practice it is possible to slide between different notes.



Try to play the following melody this way on the headjoint. Stop individual pitches with your finger; slides between specific notes are marked with a \.



the swab stick with a ruler to make sure that it is exactly 17 millimeters from the flat end.

If the cork needs to be moved in towards the blowhole, unscrew the crown a little, but do not take it off. Apply pressure with your hands or fingers to the crown. The cork should slide in slowly. If it slides very easily, the cork probably should be replaced. If it does not move at all or is very difficult to adjust, show your teacher. To move the cork out of the headjoint, twist the crown on the headjoint clockwise. This draws the screw to which it is attached further into the crown. Since the screw is threaded through the cork, it pulls the cork out. If you have never moved the cork before, ask your teacher to help.

## Shopping for a New Headjoint

Your teacher is the best person to help you find a new headjoint, but here are a few general tips to consider.

- Try many different styles and brands to find the one that works best for you.
- Headjoints can be adjusted to fit a flute if they do not fit perfectly at first.
- The blow hole should be cut straight and parallel with the tube.
- Play high and low notes and slur high to low and low to high
- Play as softly and loudly as possible and listen to the steadiness of the pitch.
- Tongue high and low notes quickly, both loudly and softly. Try double-tonguing.
- With someone listening, switch between the new and old headjoint. See if they can tell the difference without looking. Then have someone play while you listen.
- All types of playing should be easier with a new headjoint, not just a few.