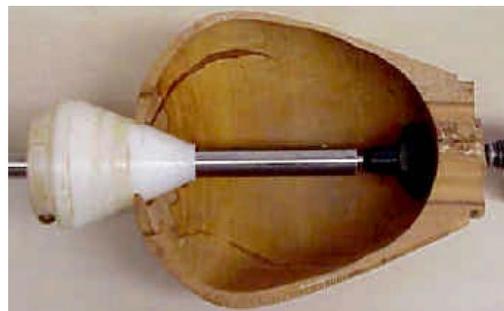


## Safe jam chuck for hollow forms

As noted in last month's YMMV, I turned my first hollow form, learned a lot, and passed some of that info on. At that point, I had not made the final reversal to turn off the tenon and put the final shape on the bottom and foot. One way to do that is between centers using a jam chuck. The problem is that using a traditional jam chuck in the head stock to hold the top of the vessel is not a good idea because if the vessel is thin, the top could easily be crushed or ripped off.

The solution is to use a method that transfers the pressure of the mount to the bottom of the vessel. The ultimate embodiment of this approach is an adjustable device called a Kirsten Cone, named after its inventor, Oskar Kirsten of the San Diego Woodturners. See, for example, [www.sdwt.org/support\\_docs/techniques&tips/kone.pdf](http://www.sdwt.org/support_docs/techniques&tips/kone.pdf). Many turners make and use them. In the photo, note that the mounting pressure between the headstock and tailstock is first applied to the bottom of the vessel, and then the cone is gently slid into place to just fill the hole. No significant pressure is applied between the cone and the top of the vessel. To tighten the tailstock further, you must first loosen the cone and then reset it.



I didn't have the time, materials, or inclination to make a Kirsten Cone at that point, but I made a simple jam chuck based on the same principle. I started with a small maple branch that might one day otherwise have become a mushroom. I turned what you see in the photo -- a tenon and shoulder to fit the jaws of my chuck and a cylindrical shaft. The diameter of the shaft just fits into the mouth of the hollow form, and the length of the shaft is just slightly longer than the distance from the inside bottom of the HF to its outside top. The top is shimmed with some loose, replaceable washers cut of a compressible material. A pad of some kind of compressible material is cut and glued onto the bottom end of the shaft.



Slide the HF onto the shaft, turn away the chuck tenon, and shape the bottom of the vessel to leave a small nib that can be carefully sawed off and sanded flat. Voila. This simple jam chuck can be reused for other vessels with a similar mouth diameter. The length can be adjusted for shorter pieces by adding solid washers as shims at the top between the wood and the compressible washers.



*Always use common sense. Things that work in one situation may not work in another. Follow all Safety Rules. If it feels wrong, it probably is; stop and rethink. **Your Mileage May Vary***