

# Making Shenandoah Tool Works Awls

[Shenandoah Tool Works](#) birdcage awls are crafted by Jeff Fleisher and Norm Reid from selected domestic and exotic hardwoods and feature a hand-forged, twisted shank. The shanks, made of O1 steel with a Rockwell hardness of 62, are sharpened to a fine four-sided point. In case you're not familiar with birdcage awls, they differ from scratch awls in that they are used by hand tool woodworkers to start holes for screws or drilling in order to achieve a high degree of accuracy.

We begin by selecting a piece of 8/4 hardwood from which we will shape the handles. The example shown is a piece of crotch walnut, which will yield a gorgeous and highly sought-after tool. We cut the blank into 2X2" sections and then crosscut these into 4" blanks from which the handles will be turned. Then we mark the centers (with a birdcage awl, of course!) and drill a 23/64" hole 2" deep in one end before screwing a mandrel into the hole.



Rough 8/4 stock crotch walnut, ready to be cut



4-inch blocks ready to be drilled and mounted on mandrels

With the mandrel inserted, the block is mounted on the lathe. Now the turning process begins. To turn the awls to their basic rough shape we employ a Vega D-36 duplicator to copy the shape of a maple pattern onto the blank we are turning. The result is a rough awl handle with a tenon attached to the tailstock end. We use an Easy Wood Tools smoother to further shape the handle.



Turning the crotch walnut blank into an awl



Rough turned awl handle on the Vega duplicator

Before cutting the tenon off the handle, we sand it to 400 grit. Then we part off the tenon and sand the end so it is smooth and blended in with the remainder of the handle shape.

Now we are ready to apply a finish. We use [Doctor's Woodshop's](#) walnut finishing oil and Pen's Plus finish. The first step is to apply the walnut oil. Using the walnut oil, we wet sand with 600 grit until a slurry is formed on the handle. The slurry helps fill grain pores as the walnut oil penetrates the wood and forms a permanent bond with it. Following that, we apply four coats of Pens Plus finish—a walnut oil, shellac and wax mixture—to the spinning awl handle, then buff it until the heat of the friction dries and seals the finish, resulting in a high shine and a durable finish.



Sanding the rough-turned awl handle

The awl shafts are made by a Shenandoah Valley blacksmith, Ed Thomas. This [video](#) shows Ed forging the shafts and giving them their hallmark

twist. Once forging is completed, we sharpen the four-sided shafts to a razor edge using a belt sander so they will give excellent performance in use. Then we mount the shafts into the handles with epoxy glue, after which they are ready for their new homes with proud woodworkers worldwide.

We produce the awls in a variety of hardwoods. The most popular are crotch walnut, tiger maple, purpleheart, marblewood and Osage orange. Other species are available as shown on our [website](#) or by special request or using your own special wood. Awls in padauk are available exclusively from [Highland Woodworking](#).



The finished awl handle, this one in crotch walnut

The awls sell for \$54.99 each, plus postage, and are shipped by priority mail.



The awl in beautiful crotch walnut, assembled and ready to put to work