

## **Multi-Axis Female Form**

This tutorial is how to make a multi-axis turned female form as shown on Chris Stott's *Basic Offcenter Turning* DVD. The multi-axis turning is fairly simple and a good beginner project in offset turning. Only the tailstock end has multi-axis points.

The trick of this piece is selecting where to start the curves for the rear and bust. It is easy to misjudge the proportions of the legs, hips and bust.



Turn blank round. This sample is 1 ½" in diameter, by 12" long



Turn a button on the end. This will be used to hold the end of the blank in the chuck. The button is not gripped by the jaws, but rather squeezed in by the bottom of the jaws. You can turn just between centers, but this button and holding in the chuck greatly improves the hold of the blank and reduces vibration.



Button held in chuck, held in place by the bottoms of the jaws. The button shape allows you to change the angle of the blank with support as you change the axis points on the tailstock end.



Mount the blank with the live center in the center of the blank.

Turn a rounded base for the figure. You can also undercut the bottom a little bit to help stability.



Begin to turn the legs. Shape the claws and blend into the gentle curve from the hips.

Sand as you go. Some of the offset turning can only be sanded by hand.



Loosen the chuck, then move the axis half way between the center and the edge. If the wood you are using has a pronounced grain, align the axis with the grain, as shown in the picture.

Remember to tighten the chuck. Turn the blank to make sure everything clears the toolrest.



Begin turning the butt and the waist. You need to start the cut for the but, so that the part way down the curve, so that there is no flat spot in the front. Turn another gentle curve from the bust to the waist. Make the waist pretty thin.

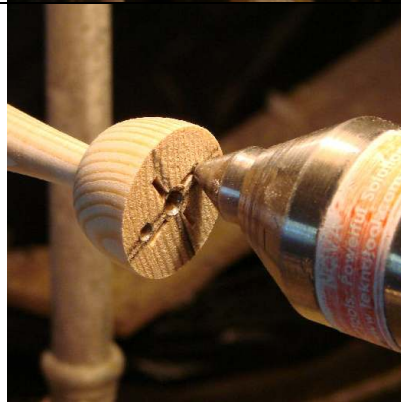


Another shot showing where the curve of the hips should end.



Loosen chuck and move the pivot point to the opposite side, halfway between center and edge.

Tighten chuck.



Turn the top of the bust and the neck. Again, check that there is no flat spot on the front of the bust. The neck should be slim and long.



Loosen chuck and move the axis back to the SECOND axis point and retighten the chuck.



Turn the head and slightly knock off the high point on the back of the shoulders.

