

## Turning off center - off axis sculptures



Having been a production bowl turner for years I needed to come up with efficient time saving methods in order to produce as much as possible in as short a time as possible.

I have carried this way of thinking over into my current line of work and after some research decided that the most efficient time saving way to produce the look I wanted was to use a vacuum system.

### In A Nutshell

- Cut the blank
- Attach a faceplate
- Turn a convex shape
- Remove faceplate
- Attach vacuum chuck to lathe
- Center blank on vacuum chuck
- True up outside edge
- Shift piece a few degrees and turn
- Shift in opposite direction and turn
- Continue on as desired
- Remember to sand prior to shifting

If you wish to color the piece later, it is a good idea to make a small incised valley between eccentric rings so that the dye or stain does not bleed over onto its neighbor.

*By using a convex surface against a vacuum chuck, in one shift of the workpiece you accomplish both an off axis and off center movement simultaneously.*



### Displaying Your Work

*Whether your piece will be hung on a wall, stand on it's own, or be mounted on a pedestal, thinking about how it is to be displayed needs to be thought about before the turning begins.*



## Process

Attach the workpiece to the lathe with a faceplate and turn a convex shape with a continuous smooth curve.

This area should be at least one inch larger in diameter than the vacuum chuck you will use.

Attach the vacuum chuck to the lathe and center the workpiece on it.

True up the outside edge of the piece and remove the screw holes from where you attached the faceplate.

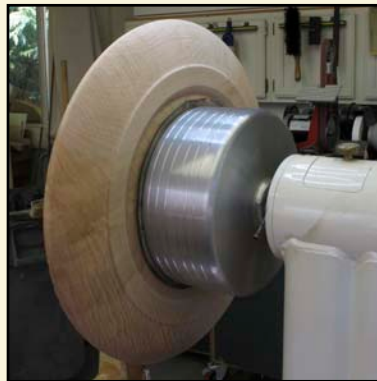
Shift the workpiece on the vacuum chuck. How much you shift depends on the size of the piece and how much of an offset you want to create.

Turn the first offset element, starting from the outside and working in towards the center.

Remember to sand each offset element before shifting the workpiece on the vacuum chuck.

Continue turning offset elements as desired.

I usually leave a convex element in the middle of the piece for carving in a design.



## Supplies

With the internet it is now easier than ever to source out supplies. Not only to find them but to price compare. Some companies charge a lot for shipping so don't forget to add this in as it can sometimes add significantly to the overall price.

## Sources of Supply

- Vacuum systems
  - [www.oneway.ca](http://www.oneway.ca)
  - [www.islandwoodcraft.ca](http://www.islandwoodcraft.ca)
- Micro motors, carbide burrs, carving tools, etc
  - [www.mhcrafters.com](http://www.mhcrafters.com)
  - [www.islandwoodcraft.ca](http://www.islandwoodcraft.ca)
  - [www.riogrande.com](http://www.riogrande.com)
  - [www.treelineusa.com](http://www.treelineusa.com)
- Rotary chisels (3 point carbide cutters)
  - [www.rotarychisel.com](http://www.rotarychisel.com)
- Woodburners
  - [www.detailmasteronline.com](http://www.detailmasteronline.com)
  - [www.nutmegwoodworking.ca](http://www.nutmegwoodworking.ca)
  - [www.mhcrafters.com](http://www.mhcrafters.com)
- Colored dyes and stains
  - [www.mohawk-finishing.com](http://www.mohawk-finishing.com)
  - [www.islandwoodcraft.ca](http://www.islandwoodcraft.ca)
- High speed air drills
  - [www.nskamericacorp.com](http://www.nskamericacorp.com)
  - [www.powerairtool.com](http://www.powerairtool.com)
  - [www.treelineusa.com](http://www.treelineusa.com)
- Bristle discs, carbide cutting wheels and shapers
  - [www.chippingaway.com](http://www.chippingaway.com)
- Inspiration
  - [www.everywhere](http://www.everywhere)

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*This style of turning utilizing a vacuum chuck system is inherently dangerous, so exercise caution, always use sharp tools and have fun.*

