

**Andy DiPietro**  
**Bytown Woodturners**  
**August 7, 2011**

This is a brief summary to the main points made by Andy DiPietro during his August 7 presentation:

## **Andy's background**

Mechanical engineer – designs large machinery  
Part time professional turner vs. full time starving artist

## **Cutting the wood**

- Planning the turning starts with the chainsaw
- When cutting the wood
  - Look for the grain pattern & wood orientation
  - Cuts the trunk 1<sup>st</sup> especially where the tree spreads & you find a very figured pattern
  - Consider the placement of the opening

Andy usually does single turning with green wood, carving or detail comes later

## **What makes a hollow form aesthetically pleasing?**

- Type of wood & natural shape
- Grain orientation & figure
- Shape & form
- Finish & texture
- Size & weight

Good Proportions cf. the Golden rectangle

Rule of Thirds

Small top opening in proportion to the base

Flowing curves & no flat sections

Using dog chain to get a form flow – will allow you to see the proper shape

## Turning your hollow form

Turning tenon for base – just a hair off perfectly square to allow jaws to bite in

Order of turning

- round piece
- make the tenon
- put in chuck
- shape the form

Work at making a long continuous curve – start with a small radius & build up.

Using a black plastic bag under the turning helps to see the outline of the curve more clearly.

Note when turning wet oak: The tannins in oak can rust the lathe ways

Hollowing the form:

Start by using a Forstner bit to drill starting w/largest & going to smaller as you get deeper

Try to hog out as much as possible before refining the thickness inside/outside, Practice by turning large openings to learn the hollowing practices

Recommends the Don Derry laser system with an industrial laser *works very well for small hollow forms i.e. less than 8" in diameter and 8" tall.* Vibration problems can damage the laser pointer – *Andy replaced his with a more robust homemade system from parts he purchased. He is very happy with the system.*

Thin walled is sometimes not practical but always make the thickness the same so that the drying of the wood will work well

Stop short of the desired thickness & then scrape the bottom within ¼ inch thickness with the scraper at center or just below center

A good way to secure the completed hollow form to turn the foot is the Woodchucker mandrel (*from Craft Supplies – Andy uses a cut ¼ inch screwdriver with sandpaper on end in place of a sanding disc or the Don Pencil version*)

Leave nub on bottom tenon to be able to put it back on the lathe for more sanding

## Sandblasting for Effect and Texturing

- Sandblasting is expensive in setting up & getting the proper system – takes a lot of time & money
- This is a form of texturing which opens up the pores & grain
- An inexpensive alternative is to use a small brass brush on the wood veins. You need to lightly sand your piece afterwards to remove the brush scratches.
- You can also try a brass wheel on lathe to score the grain – you can find different grits for these wheels – *check machine shop supplies*. Wear heavy gloves when using a wheel for protection of your hands
- For a different effect try opening up only the pores in the center rings as a contrast rather than all the pores or only the outside ones. *This type of texturing can be used on dry wood*

Another technique

Dremel with a line tool to create a chatter type pattern  
Or use rotary bits to create different patterns

Burn lines using auto detailing tape as a guide – burn by following the line – remove tape & go back over lines to darken so free hand is not necessary – use the heel of the burner to push the way of the line. Try dye in wood burner parts/pattern

Try walnut, butternut elm. They respond well to the above techniques.

## Dying the wood

- Black dye on oak works well (black, red, yellow dyes with alcohol dries faster & doesn't raise the grain as much as water (*Mohawk dyes are particularly good and can be purchased from Richelieu in Ottawa – Richelieu only sells to contractors so we may want to discuss a club bulk purchase at a future club meeting*))

- Use scrap lumber to test dyes and a garbage bag or heavy brown paper to protect the table
- When using dyes wear nitrile gloves to keep dye off of hands (*colour does not wash off, takes 3 days to get off hands*) and cheap Chinese paint brushes to apply the dye.
- Use cardboard egg crate to hold small plastic cups of colour or plastic egg crate to contain different dyes (*tip from Bytown turner*)
- Soak the inside of the hollow turning with black dye. Use a flash light to check the inside - that the colour has penetrated everywhere.
- Stand vase upside down to drain & to cover areas around the opening that you can't see.

Use a brass brush for texturing the wood lines

Put the turning back on the lathe (*if the nub is gone use a blunt point tailstock to hold it in place with a piece of fine sandpaper*) and sand piece 600 > 800 grit or higher to remove brush scratches, you can also use a steel brush to dig into the wood

- Start by dyeing the outside black, once dry sand back (try different degrees of sanding) then apply red w/white to give a medium colour; this can be followed by yellow for further mellowing of colours. There is no law as to which base colour to use, try different things to see what to do (*we colour to piss-off other turners*). Dark red on top of white gives a light red colouring. Try diluted brown dye on top for an interesting effect.
- Andy's Oakobolo series – power sand lightly on wet/dry piece – 120 grit – can also be hand sanded. Use another colour on this – yellow on red – thinned with denatured alcohol will give orange
- Use black to correct colour mistakes
- Sand back if too intense or wash with alcohol – try light or heavy sanding
- Let dry or use a hair dryer to speed up the drying process
- Put oil on it now (*Andy prefers Bush oil*) 4 coats to give a gloss appearance (apply oil w/small 1 inch brush – more coats of oil – more gloss – first coats will come out dull). Tung oil will darken piece done on top of Bush oil.

- Liming wax effect
  - Use protective plywood sheet to work on this
  - Use fingers to apply the wax so that it covers everything
  - After texturing stain wood black
  - Apply Shellac sealer (*Mohawk spray preferred*) before wax for another effect
  - Rub on the liming wax – wire brushed pores will hold more wax. Experiment using liming wax on other colours.
  - Rub w/paper towel
  - Shoe polish can be used
- Or apply paste wax (from Liberon) to pull back on white wax
- Or use black patinated wax on white (from Liberon)
- Or red dye(or any red mixed with the wax to give another contrast)
- Remember that all the defects will stand out when waxed – turn & sand well!
- Liming wax can be used on functional pieces but it must be sealed due to handling - seal with spay shellac

## Learning from doing

- Write down what you do & in what order so as to duplicate
- More importantly experiment!
- For some ideas see Ed Kelle & his coral work ([www.kellewoodturning.com](http://www.kellewoodturning.com))

## Resources

- **Mohawk products – Richelieu Hardware**, 940 Belfast Road, Ottawa ON K1G 4A2 613-737-6571 ([www.richelieu.com](http://www.richelieu.com) - *they sell large quantities mainly for contractors*)
- **Craft Supplies USA** ([www.woodturnerscatalog.com](http://www.woodturnerscatalog.com))
- **Don Pencil Woodturning** ([www.donpencil.com](http://www.donpencil.com))

- **Liberon Products – Woodchucker’s – Toronto & Wood Essence Distributing**, 2343 1st Ave N Unit B, SASKATOON SK S7K2A2 ([www.woodessence.com](http://www.woodessence.com))
- **Bush Oil** – ([www.lakeshorehardwoods.com](http://www.lakeshorehardwoods.com))